

THIS PRESENTATION WAS CREATED BY ADAM CARNOW FOR THE 2012 ESRI SOUTHEAST USER CONFERENCE. IT WAS PRESENTED IN 1 HOUR AND 15 MINUTES ON MAY 1, 2012 IN LAKE BUENA VISTA, FL.

***** Additional Notes for PDF version ***** 8/30/2012

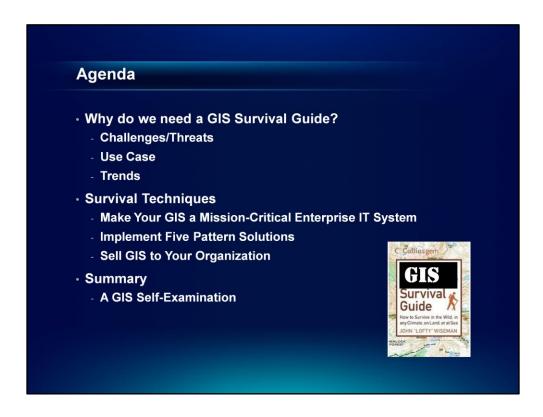
Video segment not available outside of Esri Not all links are available outside of Esri "Bad Example" sites have been rendered anonymous to protect identities

Goals

In this session about strategies for making your GIS more relevant/valuable/beneficial to your organization & ready for the twenty-first century, topics will include the following:

- How to get the most out of the technology you already own
- · How to expand the influence of your GIS
- How to keep your GIS current & adapt it to the latest trends
- · How to make your GIS an enabling technology
- How to communicate the value of GIS to your organization

Here is the abstract for this session. I wanted to remind everyone why they are here and reiterate the goals for this session. At the end I will return to this slide to make sure we met our goals.



This session will include a video and demos, not just PPT slides...

The contents of the SAS Survival Guide I based the idea of this presentation on along with comparable GIS analogies are listed below:

Be Prepared – GIS Strategic Plan

Essentials - Best Practices

Strategy – GIS Strategic Plan

Climate & Terrain – Desktop, Web, Mobile

Food – Data Management

Camp Craft – Application Development

Reading the Signs - Change Management/Customer Needs

On the Move - Mobile GIS

Health – Change Management, Annual Plan Review

Rescue - Technical Support, Training, Services

Disasters - System Failure

Why do we Need a GIS Survival Guide? Current Challenges (Threats?!?): Resource Limitations Maintaining Legacy Applications Delivering Products that Meet Market Expectations Supporting a Broad Spectrum of Users (Customers) Changing IT Trends BE PREPARED!!!

- Resource Limitations Not just staff, dollars but time and breadth of knowledge along with increased demands – needs to support desktop, web, mobile, be a master of multiple environments
- Maintaining Legacy Applications as staff is lost and budgets reduced, that makes it harder to maintain existing apps
- Meeting Market Expectations Your customers are demanding more access to GIS and they want it available to them everywhere at any time these could be optimized workflows and/or better decision making...
- You have to support casual users to professional users and all those in between
- IT trends are changing faster so this moving target provides even more stress on your resources and adds complexity

So as survival guides always preach, we need to be prepared. That's what today's session is all about. Showing you how to prepare for these situations.



So how do we mitigate these threats? By implementing survival techniques like these listed.

But how do you do this based on the fact that your resources are already limited? Esri is aware of these challenges and in response has developed two key initiatives to assist you. They are ArcGIS for Local Govt. and ArcGIS Online.

Today's session will show you how they help you meet these challenges and turn them into opportunities.



So how do we mitigate these threats? By implementing survival techniques like these listed.

But how do you do this based on the fact that your resources are already limited? Esri is aware of these challenges and in response has developed two key initiatives to assist you. They are ArcGIS for Local Govt. and ArcGIS Online.

Today's session will show you how they help you meet these challenges and turn them into opportunities.

Let's Play Pretend...

- I have a new job & need to relocate to a major city in another state.
- · I am NOT a GIS professional.
- I need to quickly & easily find key information about my new hometown & I want to share this information with my family & friends...

There are other threats to the livelihood of a GIS. My kids love to pretend so I have lots of practice with it. Let's all play pretend today and use this as a case study for the needs of a GIS customer. This is a common need for a GIS app by thousands of people every day. It is a good exercise to help you evaluate how effectively you serve this need.

February 19.5 % 36.6 % 36.3 % 4.5 % 2.	rowser Statistics Month by Month							
February 19.5 % 36.6 % 36.3 % 4.5 % 2.			-					
	2.3 % 2.3 %							
2017/0 07/17/0 03/10 /0 4/3 /0 2/	2.4 %							

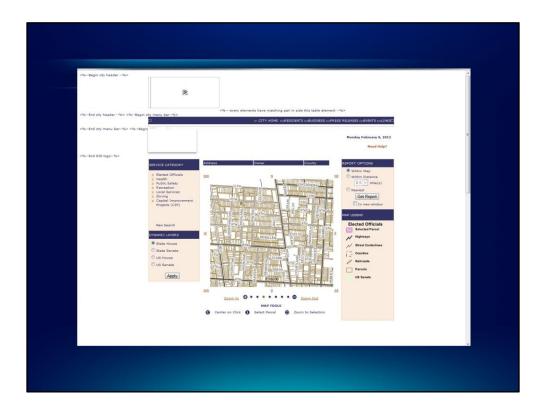
For full disclosure, you will see real screen caps of actual GIS web apps that I visited at random across the country over the last month. Some of the sites are based on Esri technology, some are not – that was not part of the selection process, it was completely random. None are in the SE region. I have covered their identity to keep them anonymous. I used Chrome as my browser and you can see that is currently the leading browser. I will show you 10 examples. All are well-known cities, they range in population from 59K to 787K. 4 are state capitals. Let's see what I found...



pop = 59,466

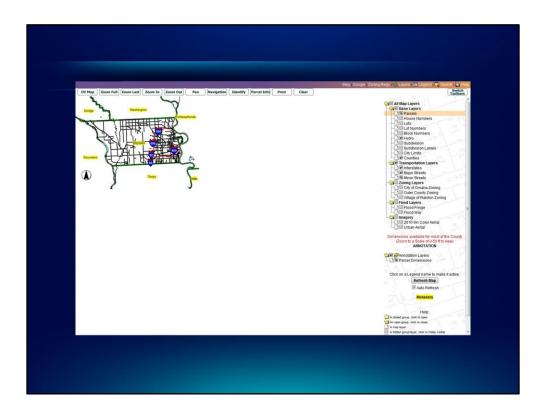
Does this app look easy to use? How about the map? Does it help me answer any questions I may have?

Goal – throw answers to questions, not data, to your users.



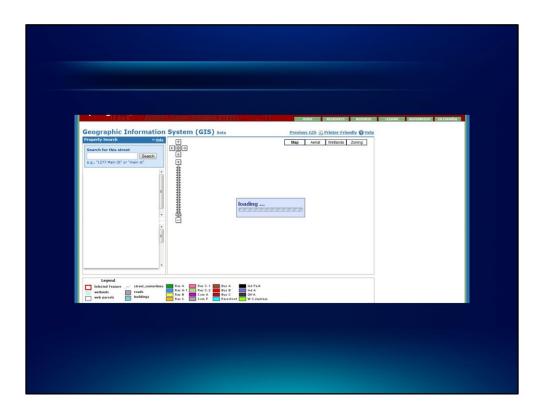
pop = 787,033

This app is giving several errors, is not easy to use and doesn't answer my questions.



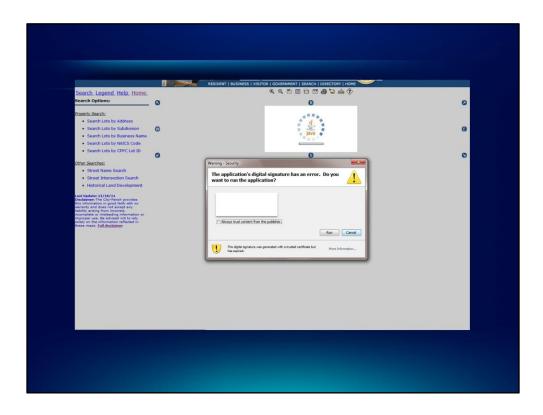
pop = 408,958

More of the same...



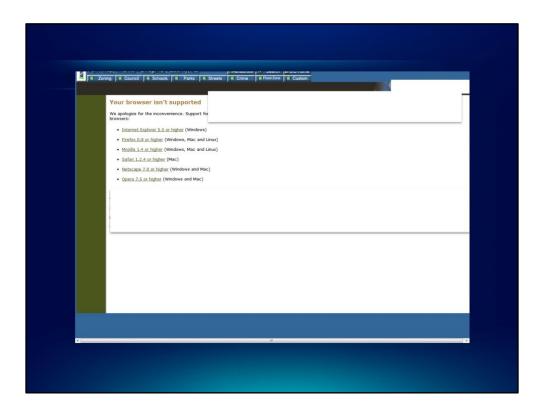
pop = 153,060

This one never did load the map.



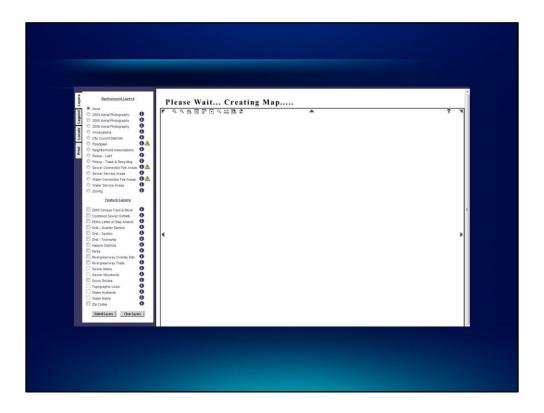
pop = 229,553

This error message is a fatal flaw. I don't know about you but I don't ever run an app like this. Also I wouldn't want to share it with others.



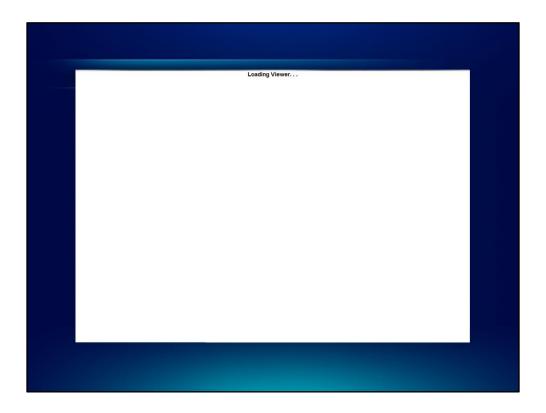
pop = 382,368

Notice the versions of the browsers supported, they are dated. Also note that Chrome is not even listed but Netscape is.



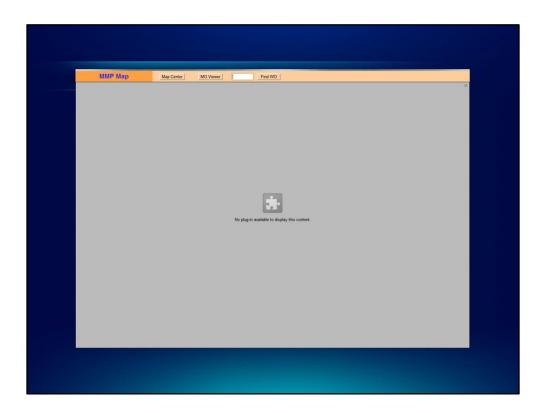
pop = 253,691

This map never loaded.



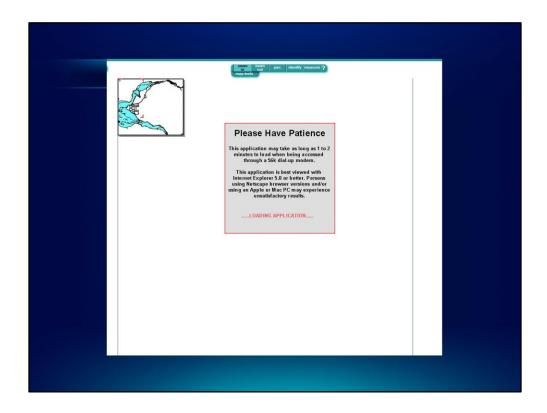
pop = 193,524

This map never loaded.



pop = 520,116

No plug-in available to display this content.

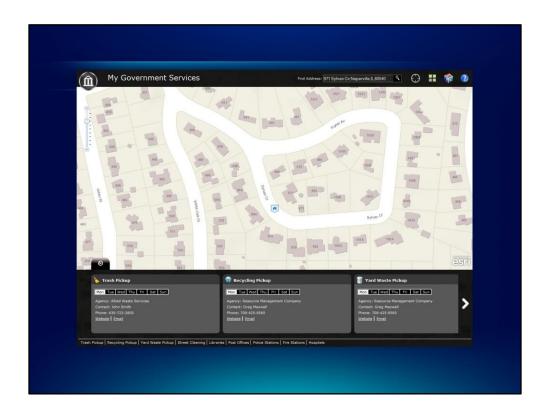


pop = 291,826

This one is my "favorite" – the message states: "This application may take as long as 1 to 2 minutes to load when being accessed through a 56k dial-up modem. This application is best viewed with IE 5 or better. Persons using Netscape browser versions and/or using an Apple or Mac PC may experience unsatisfactory results."

Not all of the sites I found were like this, but this is a large percentage of the sites I visited.

Sites like these are why GIS is endangered and needs a survival guide. If this is the public access provided by a GIS dept., they are in trouble. Hopefully your sites are not like these.

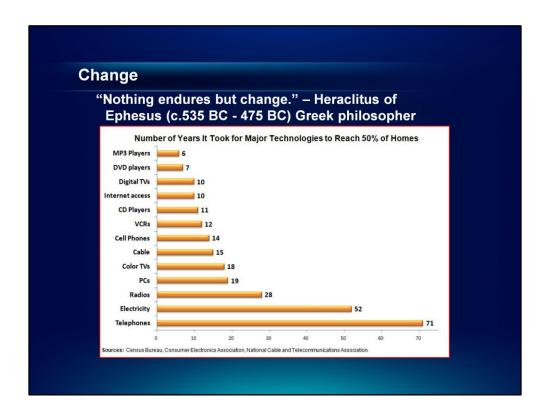


Now this looks like a nice app, let's see what it does. DEMO – My Govt Services APP – JUST CLICK ON SCREEN CAP

This application is part of our ArcGIS for Local Govt program – it is available to you as an Esri customer at no cost. You can download it, configure it, and deploy it ASAP. You get the full code, documentation and sample data. If you use it in conjunction with the data model we provide, it is supported by technical support. We will migrate it to future versions and update and improve it as well. I think we can all agree that this is an easy-to-use application that answers my relocation questions and is easy to share with others and it runs on all current browsers. It is relevant, practical and mitigates risk. It is COTS, not custom and will reduce lifecycle costs.

***** Additional Notes for PDF version ***** 8/30/2012

A live link to this app can be found at: http://localgovtemplates2.esri.com/mygovernmentservices/default.htm



Change is constant. And not only is change constant, the rate of change is getting faster, so it is imperative that for a GIS to survive in the $21^{\rm st}$ century, we must manage and plan for change.

More stats:

- •46% of adults (18+) own a smartphone
- •19% own a tablet and 19% own an e-reader

Jack Welch on Change

- · Chairman & CEO of GE 1981-2001
- GE Market Value = \$12 billion to \$280 billion
- Named "Manager of the Century" by Fortune in 1999
- "When the rate of change outside exceeds the rate of change inside, the end is in sight."
- · "Change before you have to."
- "Willingness to change is a strength, even if it means plunging part of the company into total confusion for a while."

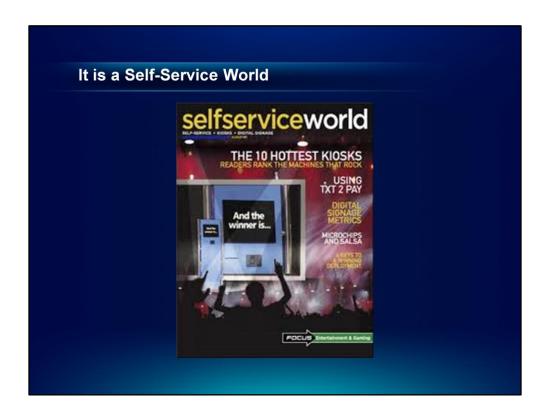
Does anyone here know who Jack Welch is? You can tell how important he thinks change management is to any organization. So it is critical that part of our survival techniques are to manage this fast-paced change in GIS.

New Rules for Enterprise Applications

- 1. Make it appealing.
 - Irresistible
 - User-friendly
 - Works on all current browsers & mobile devices
- 2. Make it transparent.
 - Answer questions, don't overload with data
 - Provide analysis, not just data
 - Deploy multiple, focused apps, not one do-it-all app
- 3. Update it often.
 - Keep it fresh, not stale (apps & content)

from Computerworld magazine

Another change is in the expectations of enterprise application users. These rules are from a recent article in Computerworld magazine and are additional GIS survival techniques for us to use. It is critical that we deploy applications that meet these guidelines. If you do not provide applications like this, customers will look for alternative solutions and frequently those solutions do not utilize your authoritative data which means customers will be drawing incorrect conclusions. You should treat these other apps as "competitors".



Another part of the changing landscape is that today the world is a Self-Service World. How do I know it is a Self-Service World? Because there is a magazine called Self-Service World. Seriously, people are wanting more and more to do things themselves. Let's look at some examples.

Use travel example...make boarding pass,



Really, every day if you look around you will see evidence of this. I travel a lot, so let's look at my travel process step by step. I check in with my airline at the airport using a kiosk. I rent a luggage cart, I order and pay for a meal, I pickup my rental car, I check into my hotel, I pay for my parking — all without dealing with a human. Just about the entire travel process with the exception of security and boarding the plane are all going self-service.



It all started with the ATM, Self-Service Gas Pump, but it is increasingly all around us — look around you and you will notice even more examples of this. Propane tank replacement, frozen yogurt, photo prints, health clinic check-in, automated postage center, pet tags, keys, movie/video game rentals, etc. GIS should also be self-service. People don't request a spreadsheet from a special dept...if a big part of your GIS work is making maps for people, you are endangered and need some survival techniques that include deploying self-service GIS. As I mentioned earlier, if you do not provide this, your customers will find it elsewhere and end up using inferior data and making incorrect decisions. Self-service GIS used to mean ArcGIS for Desktop, a high-end PC and lots of training. That is no longer the case.



Let's look at a self-service GIS – ArcGIS Online – CLICK ON SCREEN CAP TO DEMO

- Data Access
 - •(Census, Tapestry, Live Weather, Soils)
 - Mashup
 - AGS Web Services
 - •WMS
 - •KML
 - Shapefile
 - •CSV
- Edit (Park Planning)
- •Viewable on Any Device (iPad)
- •Share
- •Groups, Email, Twitter, Facebook
- Embed
- Publish as Web App
- •AGXOL
 - Dashboard
 - Presentation



That was the public version of ArcGIS Online. Now let's look at the new, upcoming subscription version of ArcGIS Online for Organizations. This is a sample site created for the City of Charlotte, NC. *CLICK ON SCREEN CAP TO DEMO*

You need to realize that this site showcases 29 maps and apps created by two staff in about a week. Think about what your staff could do with this platform. This is self-service mapping, the ability to create easy-to-use, practical and focused apps that answer questions and that will run on any device that can be updated frequently. You can quickly deploy a new web app in response to a local event. This is a huge part of being prepared and mitigating the threats we are under. This is a key part of our survival strategy.

***** Additional Notes for PDF version ***** 8/30/2012

Link = http://meckmaps.maps.arcgis.com/home/index.html



Another GIS survival technique is to make your GIS a mission-critical enterprise IT system. If your GIS is one of these systems, its chances of survival dramatically increase. The more your organization relies on it, the more customers use it, the more important it is, and therefore it will be supported. So if you are going to make your GIS a mission-critical enterprise IT system, how do you do that?



By following best practices. If your GIS is going to be a mission-critical enterprise IT system, it must be designed and run as one. That means it must follow best practices. Not just Esri best practices, but GIS and IT best practices. These sets of best practices are all tied together and reflect each other. Esri's best practices are tied directly to GIS and IT best practices. When you go to the doctor and he/she gives you recommendations on how to get better, don't you follow them? If a vendor gives you recommendations on how to properly deploy and implement its technology, you should follow them.

Email doesn't sit on one server in a back room!

IT Best Practices

- Development/Staging/Production/Publication Environments
- · Service Level Agreements
- · Business Continuity/Risk Mitigation
- · System Architecture Design
- · Environment Isolation
- · Living Strategic Plan

These are critical concepts that need to be embraced by you and become a part of your GIS strategic plan. Your IT group will be familiar with this and can assist as can Esri and our partners. Discuss each one.



This is a list of GIS Best Practices developed by the NGAC. You can go to the web site shown and download the document. Here are some of the details:

- Establish a Geospatial Program
 - Executive sponsorship & support
 - •A defined strategic vision/mission
 - Shared governance
 - A designated coordinator/manager
 - Use of recognized industry standards
 - A geospatial strategy or plan
- Develop & Maintain Data as an Asset
 - Framework/base geospatial data
 - Transactional/live geospatial data
 - Metadata
 - Published data maintenance schedule
- •Take an Enterprise Systems Approach
 - Applications (web or desktop)
 - Centralized database/data warehouse
 - Pooled software licenses
 - Mobile computing
 - Publication of consumable services (service-oriented architecture)
 - •General IT services & support
- Share with the Public
 - •Web-based data clearinghouse
 - Data feedback loop



Discuss each one. The highlighted items are links for demos. All of these best practices will help you implement a mission critical enterprise GIS that will have a higher survival rate since it requires more of a commitment, is more substantial and professionally run and is built to support mission critical work and customers. It will mitigate risk.

Use links and show the web sites. Can show community maps participants in Idaho.

***** Additional Notes for PDF version ****** 8/30/2012

Links:

http://resources.arcgis.com/en/communities/local-government/ http://www.esri.com/software/arcgis/community-maps-program



So what are Five Pattern Solutions? Let's explore them further...



Review Five Patterns

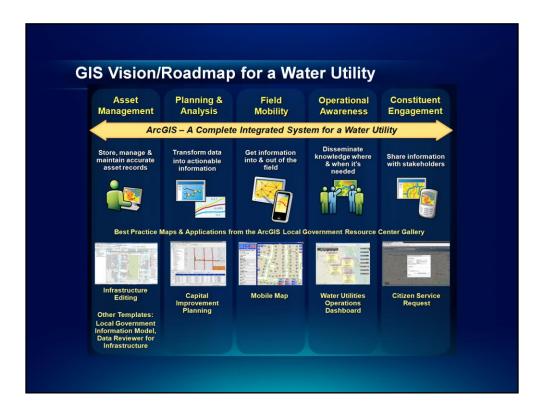
For example – ArcGIS Server can do all 5 of these patterns! Not just last two! Need to get best ROI by deploying across the entire system. No longer need a developer to address last three patterns – can use ArcGIS Online and ArcGIS for Local Government to use server immediately!



The ArcGIS System has been designed to support these Five Patterns. Whether it is from Desktop clients in the Enterprise, Server/Online/Cloud solutions, or mobile, users can use the fully integrated components of ArcGIS to have access to core GIS functionality and spatial data. Most organizations will implement the Data Management and Planning & Analysis patterns first. But it is important not to stop there. The Data Management piece is usually the most expensive and it provide the fuel for the other patterns but the ratio of expense to ROI is small. If you implement the Field Mobility, Operational Awareness and Constituent Engagement patterns, they have a much higher ratio of expense to ROI. Once you have all Five Patterns implemented, you have a true enterprise GIS or should I say GIT system. So it is critical to look for opportunities to implement all Five Patterns to support a business need. If you have ArcGIS Server, you have the ability to do implement Five Pattern solutions. If you are not using all of the capabilities of ArcGIS Server, you are not getting the full ROI for your investment. It is all about web/mobile GIS...so you need to focus on identifying and implementing web/mobile GIS solutions for your organization. If you're not doing the three patterns on the right, you are not as relevant as you should be - those are the patterns that allow you to serve the most users, make the most difference, and remove the bottleneck to access to GIS data, capabilities and benefits. More users = more relevance. Migrate ArcView users to web apps – you can do most anything in a web app now that you can do in ArcView plus it requires lower end PC, little training, easier administration, better enforcement of standards.



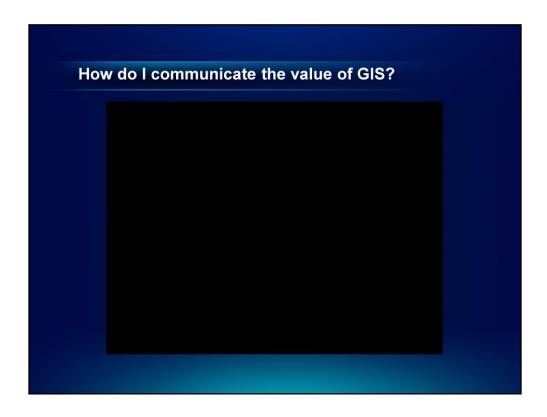
Another factor that needs to be considered when creating GIS solutions is the reason why those solutions are being implemented. Do they support some critical business need? Do they solve a problem? What value are we creating for the organization? This is a critical strategy in gaining executive/management approval of a GIS implementation by showing the value of the solution and connecting it back to the business need/problem. It is also useful to align GIS solutions with other guidelines such as established organizational strategic plans, missions, goals, key performance indicators, mandates, requirements, etc. Miami Permitting example – City of Miami is developing a web-based GIS application that will allow contractors that need street cut permits to apply online that will speed up the permitting process and generate more revenue for the City.



So another way that we can use the Five Patterns is to make it the foundation for our GIS Vision/Roadmap/Strategic Plan. I mentioned earlier the ArcGIS Resource Centers as a way we are providing ways to reinforce our Best Practices. We have developed a collection of maps and applications that are free to download that you can implement in your organization without the need for any software development. These are configurable applications. The idea is to have our staff develop maps and applications that are common to most organizations so that you are not having to reinvent the wheel or maintain a staff of developers. These maps and applications shorten the implementation time, reduce the cost and risk for implementing GIS solutions based on business needs. So in this example, I am using the Five Patterns as a GIS Vision/Roadmap for a Water Utility. At the bottom are five examples of maps and applications from our Resource Center — one for each pattern. So if you created a diagram like this for each department in your organization, identified the maps and applications that support their business, you would have a GIS vision/road map to make your enterprise GIS focused on business needs using best practices.



Another valuable survival technique is sales. This may be a foreign concept to you but it shouldn't be. Your GIS should be run as a business. The survival of any business is predicated on the success of serving its customers and successfully serving the market and dealing with competition. I have spoken earlier about the competition of commercial apps and serving your customers. Do not expect your customers to understand all that GIS can do for them and to simply walk in the door and ask for an enterprise GIS app to support their business. You have to be proactive in that respect and educate them on the possibilities and create focused five pattern solutions that directly address their business needs.



Before I get into this any further, I would like to show you a short video of our founder and president, Jack Dangermond, from last year's UC closing session on how to sell GIS to management. It includes a great story on how an Esri employee sold Jack on an enterprise system – a very valuable, executive point of view.

***** Additional Notes for PDF version ***** 8/30/2012

Unfortunately, the video is not accessible via network access outside of Esri.

Jack's Message

- GIS saves money, delivers value usually 3 to 5 times
- · Logistics can be a big value proposition
- SELL the POWER & the VALUE of GIS to management
- Get buy-in from management by aligning solutions to meet their PAIN &/or VISION
- · Be effective in communicating to management
- Be passionate
- Deliver on-time & in-budget
- Keep management engaged

This is extremely valuable advice that you should implement consistently and immediately.

- Make it Quick & to the Point
- Avoid Techno GIS Jargon

Are You Meeting the Needs of Your Customers?

- · Who are your customers?
- Do they know about the POWER & VALUE you can bring?
- Have you asked them what their PAIN & VISION are?
- Create focused, complete solutions that meet their needs



So an important attitude to have with selling GIS to your organization is to think of your users as customers. Again think like a business owner. It is an important distinction. Do you know who your customers are and what their needs are?

Internal – focus on management

External – better customer service = positive political capital

Do they know about the value you can bring?

You must SELL the VALUE of GIS

Have you asked them what their needs are?

Find out what they do

Ask them about their VISION and PAINS

Create focused, complete solutions that meet their needs

If you apply these critical survival techniques, your GIS will endure. Lake County, FL does this and after each project they author a case study as if it was going to be published in a magazine and post it on their web site. They also have a video commercial showing all of the benefits GIS has brought to the county. This is the entrepreneurial attitude you need to have.

ANOTHER WAY TO GIVE THIS SLIDE...

So let's go back and revisit the concept of your GIS users as customers. If you think of your GIS as a business, which it is, to be a successful business, you need to meet the needs of your customers. If you do not, they will go elsewhere. You need to identify your customers, both internal and external. For internal, focus on meeting the needs of management – that will have more of an impact on your success. For external, focus on increasing customer service, being able to do that will result in positive political capital which is always a good thing. You know the value of GIS – apply that to their needs. Find out what they do and how to help them. Apply GIS to their vision and pain and create focused, complete solutions that meet their needs.

+ Prioritize Solutions + COTS, not Custom + Sustainable Solutions + Reliable Solutions + Create a Solution Map Taking a COTS-Based Approach to Implementing Enterprise GIS An Esri White Paper

So once you know the needs of your customers, how do you meet them? GO THROUGH EACH BULLET. MENTION THE SCREEN CAP OF THE WHITE PAPER. Esri has some no cost solutions to help you out. ArcGIS Online & ArcGIS for Local Govt. are the answer. So what is a solution map?

So	lution Map	Example
Problem	Problem Statement	Jan. 22, 2008 FHWA Mandate – Public agencies must establish & implement a method to maintain traffic sign retroreflectivity
	Cause of Problem	Nighttime crash rate is three times the daytime crash rate – improving sign visibility helps everyone
	Negative Business Impact	Failure to adhere to federal mandate & standards, reduced sign visibility, increase in crashes, increased liability
Solution	How We Solve The Problem	Implement a GIS-based Sign Inventory & Management System using Best Practices & all five of the business patterns
	Positive Business Outcome	Full compliance with FHWA mandate, improve sign visibility, reduce crashes, limit liability, increased efficiencies, support better decisions, etc

Here is a solution map example for a problem related to a federal mandate. *GO THROUGH EACH PART OF THE SOLUTION MAP*. If I was going to present a GIS solution to an executive, this is the only slide I would need other than maybe one talking about schedule and/or budget. Notice there is no techno jargon or Esri or Arc mentioned. Another positive outcome would be reinforcing the relevance/value/importance/worth of GIS and a sustainable, enterprise GIS based on best practices that supports business needs and solves problems...We have an Esri business partner that has developed just such a solution for the City of Appleton, WI...



This is the 5 pattern solution developed by our Business Partner for the City of Appleton, WI. THIS IS A SOLUTION FROM GIS, Inc. I DID NOT MENTION THEM BY NAME UNLESS ASKED IN THE Q&A. THIS IS THE LINK TO THAT SOLUTION:

 $\underline{http://showcase.gisinc.com/documents/City\%20of\%20Appleton\%20Sign\%20Inventory.p} \\ \underline{df}$







What is the Killer GIS App?

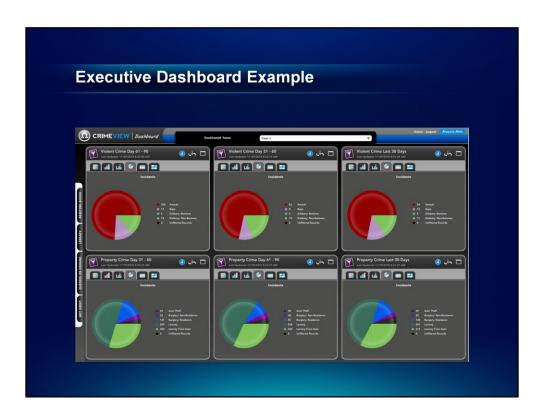
- One that turns management into daily GIS users
- Executive Dashboard
- Up-to-date Analytics
- Use daily to run their department/city/county/state/country
- Must be easy-to-use
- Must be reliable
- Make it a necessity for them to do their job

Another great way to get management support for GIS, and to increase the survival chances of your GIS is to make managers GIS users. Make them rely on GIS every day to do their job effectively. A great way to do that is with an executive dashboard application like this. Imagine what management support you would get if you implemented an executive dashboard like this that a manager used all day every day to do their job.



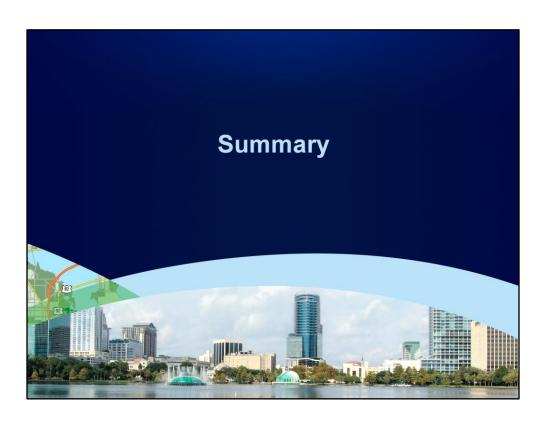
This is an example of a law enforcement application developed by one of our partners. It is easily customizable by the end user to create the view they need. They don't even know they are using GIS – it is fully integrated into their workflow and it helps them be more efficient, make better decisions – it creates value for them and the organization – it make GIS more relevant and important. To me this is the killer GIS app in regards to increasing relevance and sustainability... This application would be in the Planning & Analysis and Operational Awareness patterns...this is a web-based application running in a web browser. THIS IS THE CRIMEVIEW DASHBOARD PRODUCT FROM THE OMEGA GROUP. I DID NOT MENTION THEM OR THE PRODUCT BY NAME UNLESS ASKED DURING Q&A. THIS IS THE URL FOR THAT PRODUCT:

http://www.theomegagroup.com/police/omega_dashboard_police.html









A GIS Self-Examination Is there a bottleneck for access to GIS? Are you proud of your GIS? How do you measure success? What are your plans for your GIS?

GIS Manager quote: "We should be ready to roll out some mobile apps in about 2 years."

How do you measure success?

- •Number of layers maintained?
- •Number of maps produced?
- •Number of edits made?
- •Amount of money saved/made?
- •Amount of time saved?
- •Amount of better decisions made?
- •Amount of apps deployed?
- •Number of users?
- •Customer satisfaction?

A GIS Self-Examination

- Are you on version 10? If not, when?
- Do you have any IMS or Web ADF applications in production? If so, when will they be replaced?
- · Are you using ArcReader in production?
- · Are you using shapefiles?
- Are you participating in our beta programs?

GIS Manager quote: "We should be ready to roll out some mobile apps in about 2 years."

How do you measure success?

- •Number of layers maintained?
- •Number of maps produced?
- •Number of edits made?
- •Amount of money saved/made?
- •Amount of time saved?
- •Amount of better decisions made?
- •Amount of apps deployed?
- •Number of users?
- •Customer satisfaction?

A GIS Self-Examination Does your annual GIS budget include funding for: Software? Hardware? Training? Services? Data? Can you justify your GIS budget?

Letter from Mayor about justifying GIS expenses. Your answers to these questions will indicate where you need to apply these survival techniques. You should continually ask these about your GIS each year as part of the living strategic plan.

A GIS Self-Examination Do you have management support? Are you prepared for change? Are you proactive vs. reactive? Are you innovative?

Letter from Mayor about justifying GIS expenses. Your answers to these questions will indicate where you need to apply these survival techniques. You should continually ask these about your GIS each year as part of the living strategic plan.

Goals

In this session about strategies for making your GIS more relevant/valuable/beneficial to your organization & ready for the twenty-first century, topics will include the following:

- How to get the most out of the technology you already own
- · How to expand the influence of your GIS
- How to keep your GIS current & adapt it to the latest trends
- · How to make your GIS an enabling technology
- How to communicate the value of GIS to your organization

So let's review our goals and make sure we addressed them in the presentation...

- 1. AG4LG, AGOL, 5 Patterns
- 2. AG4LG, AGOL, 5 Patterns
- 3. AG4LG
- 4. AG4LG, AGOL
- 5. Sell it

Embrace Change

Follow the New Rules for Enterprise Applications

Implement Self-Service Mapping

Make your GIS a Mission-Critical Enterprise IT System

Implement Five Pattern Solutions

Sell GIS to Your Organization

Make Managers GIS Users

Turn Challenges into Opportunities

Align Solutions to Solve Critical Business Needs

Esri & Our Partners Can Help

***** Additional Notes for PDF version ****** 8/30/2012

AG4LG = ArcGIS for Local Government

AGOL = ArcGIS Online

"Good business leaders create a vision, articulate the vision, passionately own the vision, & relentlessly drive it to completion." — Jack Welch

Use GIS to:

- •Make a Difference in Your Organization
- •Understand, Plan & Improve Your Community
- •Increase Collaboration
- •Communicate More Effectively

