THE DEFINITIVE GUIDE TO
SHARING GIS MAPS

6 *Best Practices for Sharing Interactive Maps with Anyone, Anywhere*

TERRAGO

Let's get started

From paper to PDF, from GIS to the cloud, the ability to share maps with people outside the office has changed dramatically over the last decade. With the rise of web services, cloud computing and mobile devices, there are more ways to share maps than ever before.

But even with advances in technology, simple, effective map sharing continues to be a challenge for many GIS departments.

Feature-rich maps help organizations make better decisions faster, but if a map and its underlying data can't get in the hands of the people that need it, that power is lost.

With a focus on best practices, analysts can bring the power of GIS to internal employees, external stakeholders, outside organizations, remote field workers and end users.

This guide shows you how to:

▶ Maintain Control

▶ Increase Portability

▶ Improve Accessibility

▶ Ensure Collaboration

▶ Guarantee Offline Availability

▶ Archive Map Data
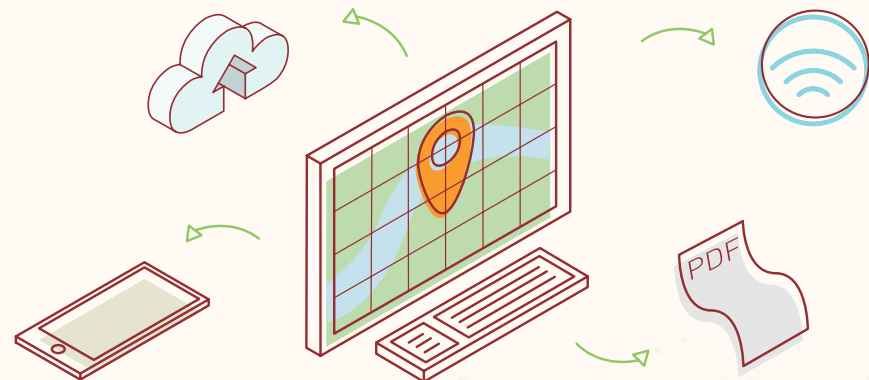
① Power is Nothing Without Control

As a GIS professional, you're used to being in control.

You're an expert at assembling multiple data layers within your maps and updating each layer with the most accurate information and coordinates available.

You know your data inside and out and you don't want anyone else messing with your maps.

But most end users of your mapping products only require a fraction of all that data at their fingertips.

Being able to control exactly what layers or data end users can or cannot access allows you to create a multi-purpose map tailored to your intended audience's needs, without worrying about sensitive information being leaked.
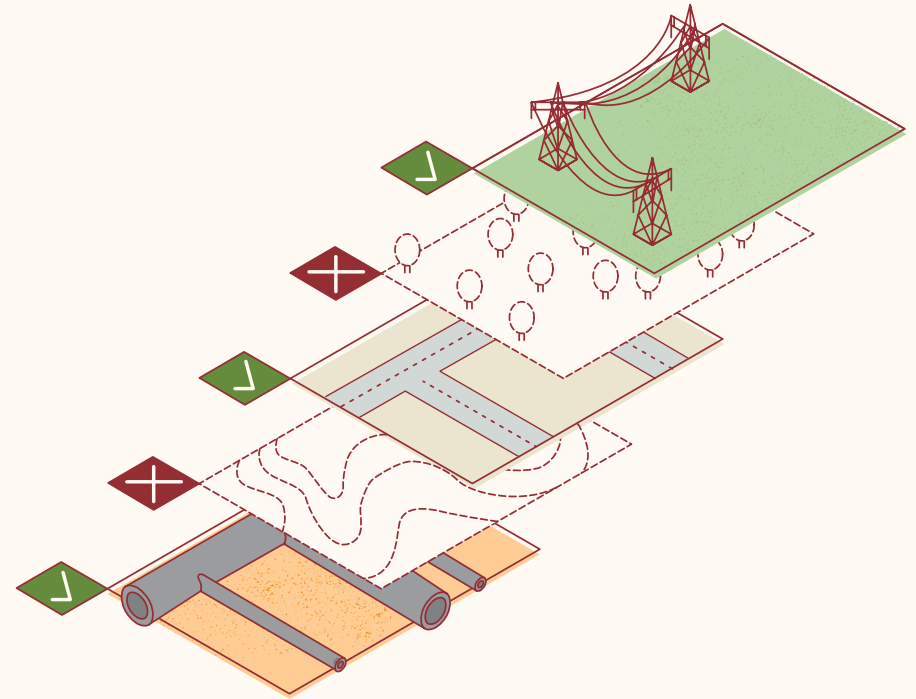
Maintain Control

▶ Toggle mission-critical layers on and off

▶ Embed photos, multimedia and hyperlinks

▶ Improve map functionality for end users

② Have Map, Will Travel
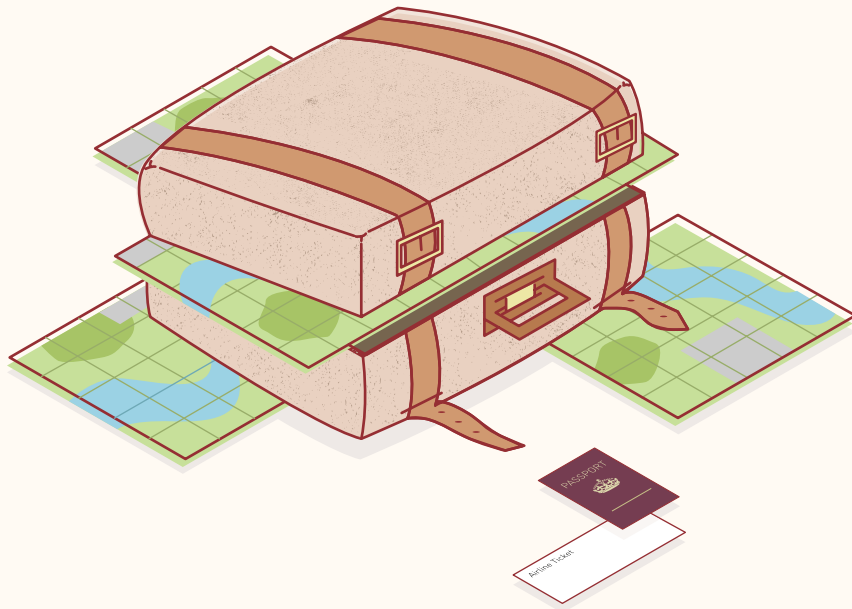
You can take a good, old-fashioned map with you wherever you need to go.

But with high-resolution satellite imagery and complex data sets, it's complicated to share multi-layered, data-driven digital maps with other people, especially when they're measured in gigabytes and terabytes, instead of megabytes.

To easily share your GIS information with internal and external end users, you need the ability to choose essential layers and attribute data, and compress imagery to create digestible file sizes.

Increase Portability

▶ Compress imagery and data

▶ Create manageable file sizes

▶ Empower map users in the field

Reasonable map sizes allow you to easily collaborate with anyone, anywhere.

Like a genie in a lamp, you need infinite mapping data to fit into an itty bitty living space, compressing large images and data sets into smaller file sizes.

③ One for All and All for One

Sharing GIS once meant your users needed access to your same expensive GIS infrastructure. Fortunately, it's now much easier. And, you even have choices.

You can utilize a GeoPDF® document that is accessible to anyone, anywhere with free Adobe Reader® software. Or you can employ a cloud-based server solution that allows maps to be viewable in a web browser on a laptop, desktop or mobile device.

It's imperative to keep in mind the map user's location and available technology. Your user may be in an office or in the field, may have Internet access or be out of range, or may or may not have the authority to install needed software or require permission to do so.

Granting map access to non-expert GIS users enables your GIS to be most impactful.
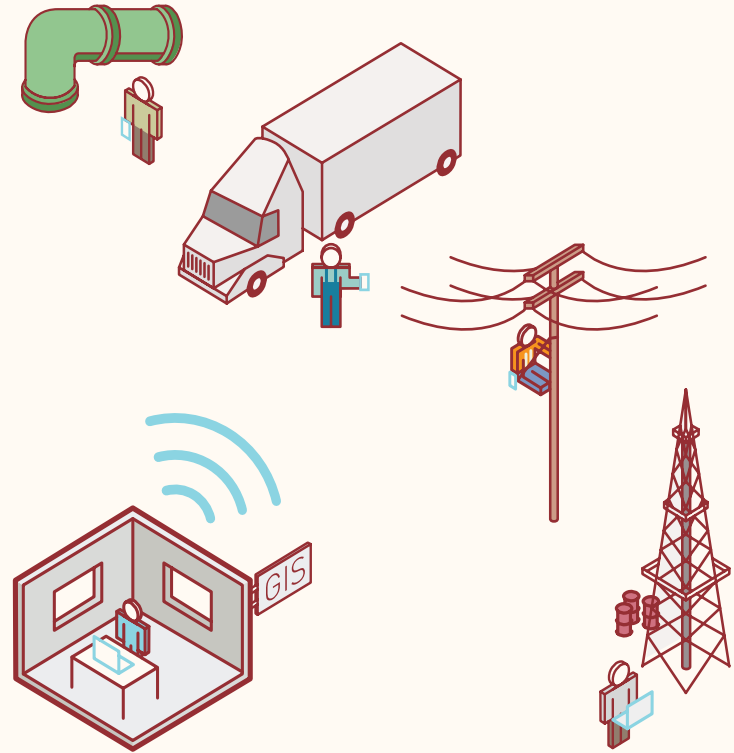
Improve Accessibility

▶ Allow users with limited training to access GIS

▶ Ensure maps can be utilized anytime, anywhere

▶ Develop enterprise-wide engagement with GIS

④ Many Heads are Better Than One

GIS becomes static or outdated unless regularly revised and updated with dynamic field data.

You know the drill. You receive a printed map covered with disorganized notes. You must then interpret any changes, so your GIS matches this timely, on-the-ground intelligence.

Well, you no longer have to worry about managing Post-It® Notes and deciphering chicken scratch.

Ensure Collaboration

▶ Eliminate the need for pen and paper updates

▶ Share dynamic field data with headquarters

▶ Create a common operating picture for all users

With the right GIS extensions, your end users can digitally capture field data in a format that enables dynamic updates without expensive technology upgrades or proprietary hand-held devices. Photos, notes, voice memos and mark-ups can be round-tripped back to headquarters, keeping your maps current and eliminating paper updates.

So stop manually updating and start efficiently collaborating.

5 No Cloud Hanging Over Your Head?

For some of us, getting unplugged is a luxury, something easier said than done.

But some end users have no choice. In the field, they cannot depend on a reliable Internet connection, high-speed data plan or cloud-based server farm to download maps, render complex imagery or connect to an external database.

Putting your maps in a portable container, such as a GeoPDF, permits your users to load files on a laptop, desktop or mobile device and to transport information into the field, regardless of Internet connection.

Don't put your users in an all-or-nothing situation. When mission success depends on map availability, send users off-roading as needed — even where there's no data roaming to be found.
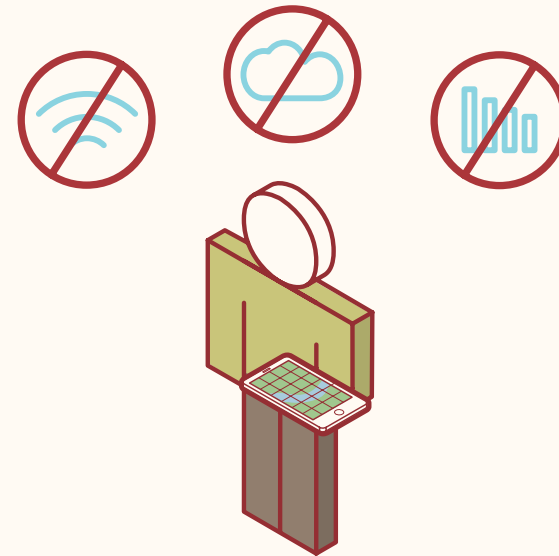
Guarantee Offline Availability

▶ Outside the office walls

▶ Inside a remote forest

▶ On an empty highway

▶ In the middle of an ocean

⑥ *Capturing the Moment*

Having the latest and greatest data dynamically updated in the field is a good thing, but sometimes documenting the state of a map in a given point in time is a good thing, too.

Being able to archive a time-stamped map could allow an executive to readily justify why a specific decision was made.

But this isn't easy without restoring a backup file to GIS or even possible with a constantly changing cloud- or server-based environment.

A document like a GeoPDF allows end users to reference a self-contained file with all of the underlying database information intact, as well as a time-stamped version of the map data, which can be a lifesaver if a project goes off-track or if new information becomes available.

Archive Map Data

▶ Capture a point in time

▶ Validate a past decision

▶ Preserve enterprise history
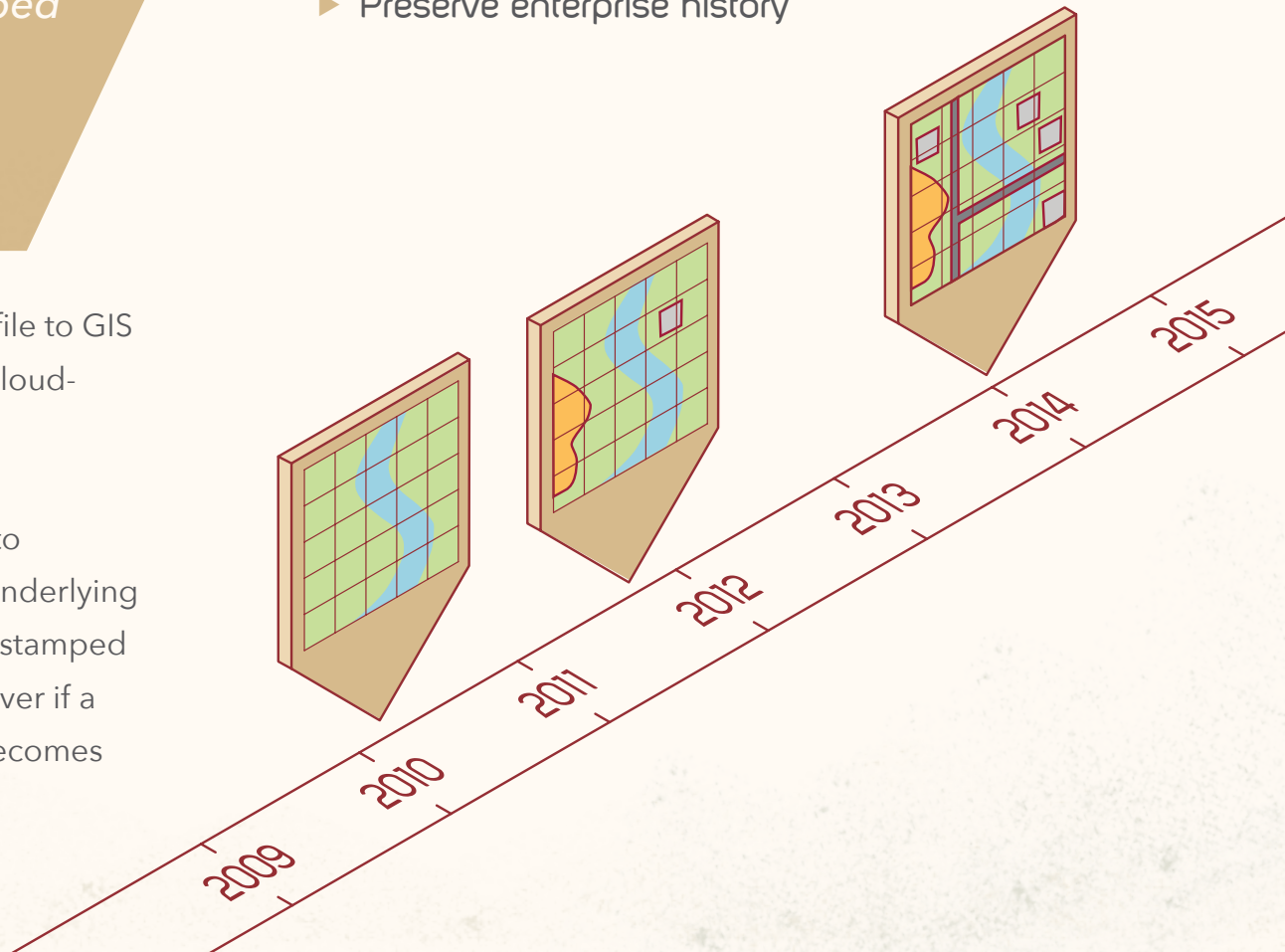
Preparation Checklist for Sharing Maps with GIS
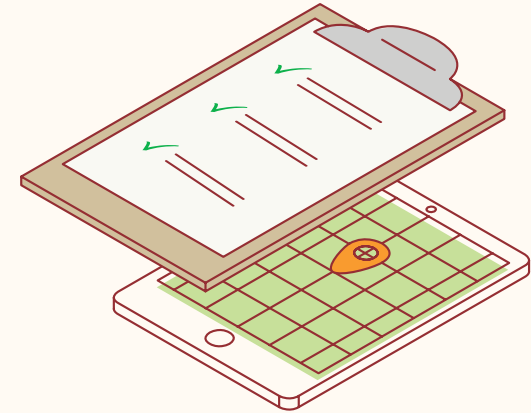
Whether you're using a web browser or a GeoPDF map or pushing your GIS to a mobile device, consider these actions to externally share maps with ease:

Who

- ☐ Consider what type of user needs access to your GIS
- ☐ Identify the end user's level of technical expertise
- ☐ Determine what software is on the user's computer

What

- ☐ Clarify which maps and information the user requires
- ☐ Decide which layers and attribute data to share
- ☐ Understand the user's file size requirements

Where

- ☐ Determine where the user will need to access your maps
- ☐ Ask if the user will have Internet access in this location
- ☐ Figure out if the user will need to access this data offline

When

- ☐ Ask the user when they need access to the data
- ☐ Inquire about key user deadlines, meetings or events
- ☐ Ensure you can grant access or export the file in time

Why

- ☐ Identify why the user needs your GIS maps and data
- ☐ Understand what decisions the user needs to make
- ☐ Determine if the user needs a GeoPDF document

How

- ☐ Identify how the user prefers to receive the GIS maps
- ☐ Determine if you can deliver the data in that format
- ☐ Use a web browser, shared network, USB stick, DVD

Moving Forward

We've offered the six best practices for sharing GIS maps.

1. Maintain Control

2. Increase Portability

3. Improve Accessibility

4. Ensure Collaboration

5. Guarantee Offline Availability

6. Archive Map Data

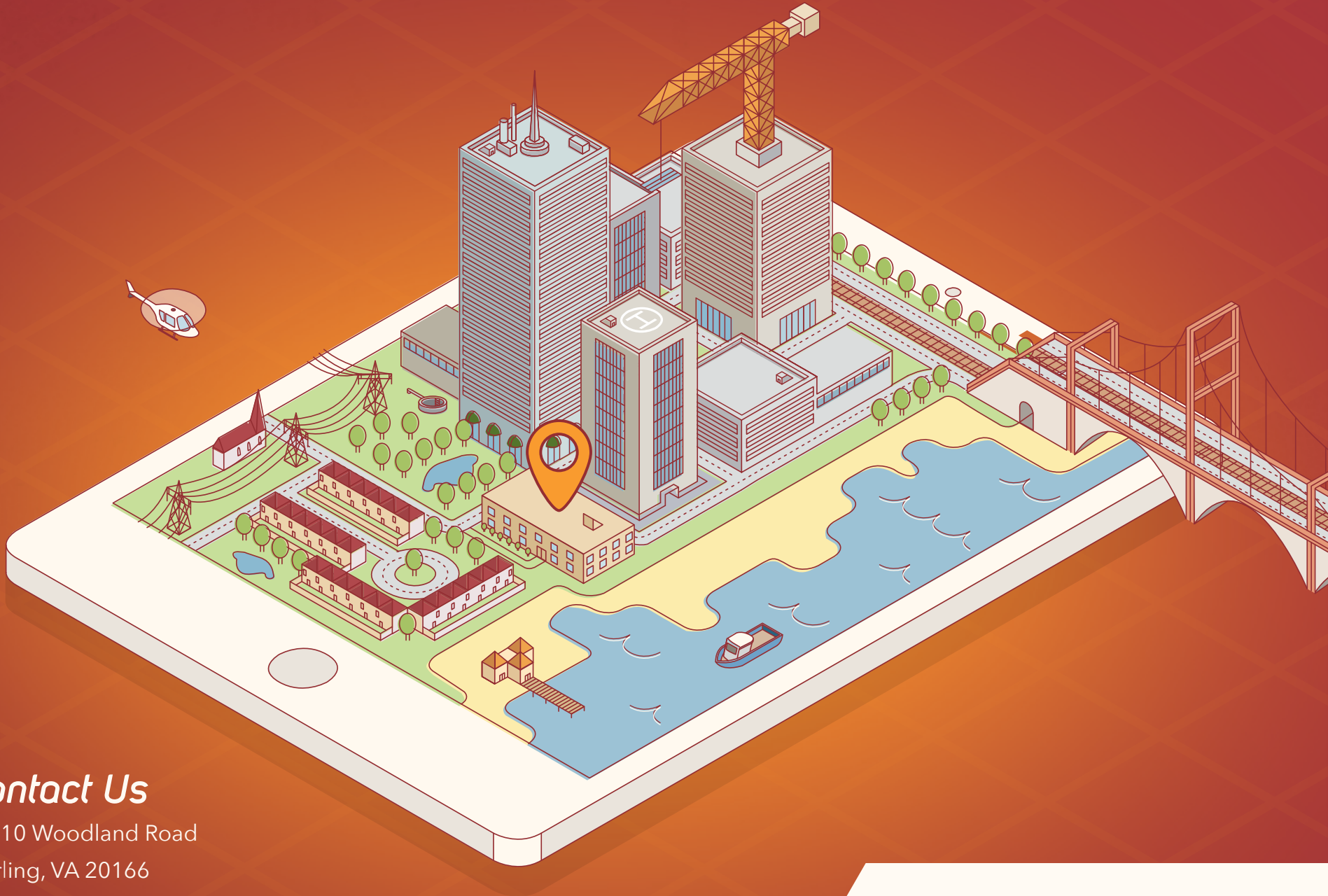*TerraGo's GeoPDF can ensure you get the right map to the right person at the right time.*
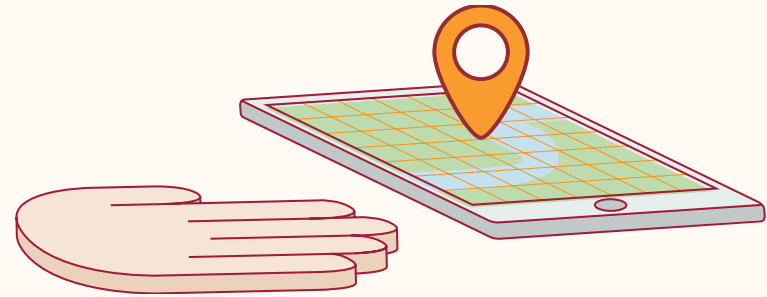
If these are industry-wide best practices, you need the ability to execute these recommendations with ease. You need to be in control of your map — a map as portable as it is accessible. A map that improves collaboration and travels offline. A map that's easily archived.

You need a GeoPDF map

Download a trial version of TerraGo Publisher for ArcGIS to begin producing maps that can be accessed by anyone, anywhere in Adobe Reader.

Get More from GeoPDF

Download the free TerraGo Toolbar for Adobe Reader if you want to see how your end users can get even more from your GeoPDF maps.

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