ASSET MANAGEMENT BASICS

A GUIDE FOR COMMUNITIES OF ALL SIZES

Cartegraph powered by aws

6 STEPS TO SUCCESS

1. FIRST THINGS FIRST
   What Is Asset Management?
2. WHERE TO BEGIN
   Crafting Your Asset Management Strategy
3. FACING THE FACTS
   Do I Really Need an Asset Mangement System?
4. FINDING THE RIGHT FIT
   7 Steps to Selecting a Killer Asset Management System
5. ALL SYSTEMS GO
   Performing Your Initial Inventory
6. ALL IN A DAY'S WORK
   How To Maintain Your System

YOUR CITIZENS ARE COUNTING ON YOU

You're not in local government for the money or recognition. You're here because you care about your citizens and want to leave your small city or county better than you found it. You try to use taxpayer dollars to deliver the best possible outcomes for your residents, and your blood, sweat, and tears have gone into building a safe, sustainable community that will last for generations.

BUT, YOU MAY BE LETTING THEM DOWN

If you're using intuition or best guesses to make decisions, you're failing your citizens. If you're managing infrastructure assets with spreadsheets and stacks of paper, you're wasting time and resources. And, if you're not planning ahead, your community is ill prepared for the future.

From crafting your asset management strategy and finding the right system for your community to performing your initial inventory and maintaining your system investment, this ebook will guide and support you every step of the way.

GET UP TO SPEED

You know there must be an easier way to run your community with confidence and clarity. More cost-effective approaches to help your team increase efficiency and productivity. New tools you can use to improve regulatory compliance and justify your budget requests. But, change can be daunting—so how and where do you begin?

Whether you're looking to adopt a more modern approach to asset management, fix your current asset management system, or take your technology to the next level, this guide is here to help. From crafting your asset management strategy and finding the right system for your community to performing your initial inventory and maintaining your system, this ebook—complete with practice worksheets—will guide and support you every step of the way.

And remember, We're here to help. If you have any questions or comments, please feel free to reach out and connect with us.

Best,

Customer Success

success@cartegraph.com
cartegraph.com

1

FIRST THINGS FIRST

WHAT IS ASSET MANAGEMENT?

Your citizens invest tax dollars, land, and other resources into your community to ensure a good quality of life. According to our friends at the American Public Works Association, asset management refers to the current and future activities of deciding how to develop, operate, and maintain your infrastructure in order to achieve the greatest possible economic, environmental, and social benefits from that investment.

In other words, it's your job to make sure your city's assets are maintained and used responsibly so your citizens are getting the best bang for their buck. The definition may sound simple, but when you're dealing with thousands upon thousands of assets, that's no easy task.

Think about all the assets your city may be responsible for, such as:

- Bridges
- Construction equipment
- Facilities
- Flood protection
- Guardrails
- Lighting
- Pavement markings
- Parks
- Roads
- Sanitary sewers
- Signs
- Storm sewers
- Traffic signals
- Trees
- Water distribution systems

Now think of all the work that goes into keeping those assets functional:

- Budgeting
- Citizen requests
- Construction
- Coordinating office staff and field crews
- Routine maintenance
- Prioritizing maintenance projects
- Providing information and reports
- Working with vendors and contractors

Without accurate and up-to-date information on the assets you have, the condition they're in, and how much they're costing you, your city simply isn't managing your assets efficiently, deploying resources effectively, or spending money wisely. And your citizens? They're not going to be very happy about that.

BLAST FROM THE PAST

THE EVOLUTION OF ASSET MANAGEMENT

To borrow a page from science historian James Burke:

"YOU CAN ONLY KNOW WHERE YOU'RE GOING IF YOU KNOW WHERE YOU'VE BEEN."

And, believe it or not, managing infrastructure assets is nothing new. The ancient Roman aqueducts were regularly inspected and maintained by patrol teams who repaired cracks and cleared debris. The Romans even appointed a high-profile curator aquarum —or water commissioner— to care for and govern the aqueducts.

Cities have understood the importance of taking care of their infrastructure assets for centuries.

Yet, the term "infrastructure asset management" wasn't widely used until Great Britain privatized their water utilities in the 1980s. The term was further adopted in 1993 when the Australian Accounting Standard 27–AAS27 was issued, and government agencies were required to consider the life and cost effectiveness of asset investments.

By the early 2000s, basic infrastructure asset management principles had spread far and wide, and a series of international handbooks and manuals were published in rapid succession. The guides propelled cities to become more efficient, effective, and productive in the management of their assets, and to move beyond the limitations stand-alone actions, unverified information, decentralized data management, and perception-based decision making.

Today, innovative technology is helping high-performing organizations ditch outdated tools and processes—such as complicated spreadsheets, endless rows of filing cabinets, and paper maps—for modern, mobile asset management technology. Instead of dreaded morning assignment meetings or hours of end-of-day paperwork, field crews can collect assets, assign work, and monitor costs on-the-go from their smartphone devices.

2

WHERE TO BEGIN

CRAFTING YOUR ASSET MANAGEMENT STRATEGY

Your city is one-of-a-kind, so there is no "one-size-fits-all" asset management strategy. The good news is that there are foundational goals, principles, and best practices surrounding asset management that your organization can begin building upon.

The purpose of asset management strategies—and the technologies that support them—is to preserve the service life of your assets and proactively streamline your day-to-day asset management operations. This is accomplished by intervening at strategic points in an asset's normal lifecycle to improve its current performance and extend its expected service life.

7 STEPS TO YOUR ASSET MANAGEMENT STRATEGY

Whether you're making updates or starting from scratch, building a sound asset management strategy can be pretty intimidating. Which is why we've outlined the route your organization needs to take to get there. When considered carefully, and followed in order, these seven essential steps will help your team create an asset management strategy tailored to your city or county's unique needs.

1 COLLECT DATA

Smart asset management is powered by data—current, accurate data that tells you exactly what assets you have, where they're located, and how much they're worth. Collecting accurate data is crucial to making good decisions and implementing a productive asset management strategy.

2 ASSESS CONDITION

One thorough inspection can tell you how an asset is performing, what life it has left, and whether it's worth the money you spent on it. You can use this condition data to inform your organization's current and future infrastructure maintenance needs.

3 DETERMINE VALUE

Consider the asset's purpose and place in your city's infrastructure, and what happens if it fails. Valuation is essential to your asset management strategy because it requires you to prioritize your assets and the resources needed to sustain them.

4 GAUGE PERFORMANCE

Identify the factors that measure each asset's performance. At what point is it considered faulty or unsafe? Does the public expect it to look good? Answering these questions reveals the baseline for maintaining an asset.

5 PROACTIVELY STRATEGIZE

There's a time to repair and a time to replace. Create an asset management strategy that is proactive in its scope and realistic for your city and workforce. Use data and cost-benefit analysis to help you decide what to do and when to do it.

6 PUT INTO PRACTICE

Install, maintain, inspect, and—if need be—replace. Then do it all again for every network and asset your city has. With a well-planned strategy in play, you'll steadily improve your infrastructure and the system supporting it.

7 FOLLOW THROUGH

Smart asset management is all about patience, planning, and execution. Regular, proactive monitoring is the key to working efficiently and effectively to make sure your city's assets are maintained to your satisfaction.

CASE STUDY

HOW TO TAKE BACK 30 MINUTES A DAY

Tracking work and assets used to be cumbersome for the City of Kingsport, TN. Jobs were entered into a DOS-based program, printed out with maps, and physically assigned out to 250 field professionals each morning.

The process was inefficient and ineffective, and the City knew it was time for a change. Today, Kingsport crews use a mobile asset management system and iPads to receive assignments and complete work on the go. The move to mobile has eliminated Kingsport's morning assignment meeting, saving more than 30 minutes a day for their entire team.

LEARN MORE ABOUT KINGSPORT »

3

FACING THE FACTS

DO I REALLY NEED AN ASSET MANAGEMENT SYSTEM?

For decades, cities just like you have relied heavily on complex spreadsheets, stacks of paper, folded maps, and the knowledge of veteran employees to manage their assets—but it simply isn't working anymore. Every day, you're facing tight budgets, deferred maintenance funding, pressures to cut public spending, aging infrastructure, increased regulations, and a retiring workforce —yet you're still expected to maintain the same level of performance.

Trying to do that alone sounds pretty crazy, doesn't it? This is where a simple, powerful asset management system can swoop in and help you manage and maintain your infrastructure assets. A good asset management system will help you know what assets you have, the condition they're in, and how much they're costing you, opening the gates to:

- Improved efficiency and effectiveness
- Increased organizational productivity
- Extended asset lifetime and increased return on investment
- Better risk identification and mitigation
- Data-driven decision making
- Defendable investment requests
- Increased cost savings and transparent fiscal responsibility
- Enhanced citizen satisfaction and service delivery
- Better disaster preparedness and faster response time
- Improved regulatory compliance
- Integrated departments, initiatives, and budgets
- Streamlined internal communication
- Long-term system integrity and sustainability
- Faster responses to emergencies and increased safety

Sounds like a pretty good tradeoff. After reading all that, maybe the question should be why isn't your city already benefitting from an asset management system?

30 DAYS IN 5 MINUTES:

HOW DOES YOUR CITY STACK UP?

Wonder if you're running your small city with confidence and clarity? Take 5 minutes, and see how many of these questions you can answer about the last month:

1. How many outstanding requests do you currently have?
2. On average, how long did it take you to resolve your requests?
3. How many citizens reached out to you with requests?
4. What was your most common maintenance activity?
5. What was the last asset your team inspected?
6. What was the condition of the last asset your team inspected?
7. What asset cost you the most to maintain?
8. Which of your field professionals accomplished the most work?
9. What is the current value of one of your vehicles?

A solid asset management approach with quality data should enable you to answer all 9 questions in a flash.

Not happy with your results? It may be time for you to refine your strategy and consider adopting an asset management system—or reevaluate the one you're currently using.

4

FINDING THE RIGHT FIT

7 STEPS TO SELECTING A KILLER ASSET MANAGEMENT SYSTEM

Just like your asset management strategy, there isn't a single, universal asset management system. However, there are tips and best practices your team can follow to avoid mistakes and overcome the challenges associated with researching, selecting, and implementing the right asset management technology.

Before you get going, it's important to understand that implementing an asset management system is not a project—it's a process. There is no beginning or end, but a series of ongoing steps toward creating a successful system. Building and maintaining the right system is an investment, and the most important steps are taken before you even begin comparing solutions or collecting asset information.

These are the seven steps you need to take to ensure your team builds an effective asset management system at the end of the day:

1 DETERMINE YOUR KEY PLAYERS

After hearing all the benefits of using an asset management system, you probably can't wait to get started. But, are all your major players on board with you? Most implementations are unsuccessful due to a lack of the three C's:

COMMITMENT COORDINATION COMMUNICATION

The key to keeping the process moving forward is to build agreement throughout your entire organization from the get-go. Once your entire organization is on board, identify key team members that will participate in the process, and the role they will play in selecting the tools, developing the inventory, and maintaining the system.

All areas that will use, manage, approve, and purchase your system components should be represented. This includes data entry personnel, finance administrators, maintenance supervisors, public works directors, GIS personnel, engineers, IT staff, and city and county administrators.

GET TO WORK

Need help organizing your list? Don't worry—we've created a handy-dandy worksheet to get you started.

Start organizing. Head to *Worksheet 1: Determine Your Key Players*

2 DEFINE YOUR SYSTEM GOALS

Now that you have your decision makers together, it's time to determine your asset management system goals. This fundamental—yet often overlooked—step in the process will make sure your efforts are aligned with the larger vision and priorities of your city, county, or state. This will help you justify the need for an asset management system in the first place, ensure everyone in your organization is on the same page, and set you well on your way to measuring your progress and return on investment.

As your group begins to write one to three clear goals, remember to think SMART:

- **Specific:**
  What exactly are you trying to accomplish?
- **Measurable:**
  How will you know if you've been successful?
- **Achievable:**
  Can this target realistically be met?
- **Relevant:**
  Is this aligned with your organization's larger vision and goals?
- **Time bound:**
  When should this target be met?

"This is a multimillion-dollar business. There's a lot of money out there—taxpayer dollars. We need to be efficient and competitive, put out quality work, and have good outcomes. That's what the citizens expect, and that's what we should expect out of ourselves too."

JEREMY REICHERT

Transportation Dept. Operations Manager, Adams County, CO

3 PINPOINT YOUR SYSTEM REQUIREMENTS

So, what does your team expect to get out of your asset management system? Are you looking to have a solution up and running within a month? Looking to make life easier by having a solution that links with other department databases? Determining your short-term and long-term requirements for the system will not only streamline your implementation process—but also simplify your system tools selection.

Remember to approach your system requirements from both an internal and external point-of-view. Internally, maybe you want to build an asset inventory that includes features, location, and present condition—but externally you need to be compliant with external requirements such as GASB34, D.O.T., or E.P.A. reporting. Taking a little bit of extra time now can save you major headaches down the road.

Once you have your list of system requirements identified, go through and prioritize them. Some may be essential to the initial phase of the asset management system, while others should be included during later phases. Remember, you need to crawl, then walk before you can run, so now's a good time to start setting realistic expectations. Start with what's most important and expand your system over time.

GET TO WORK

Don't worry, we've got your back. Check out our system requirements worksheet to help your team identify your requirements and priorities.

See if a system is up to snuff. Go to *Worksheet 2: Pinpoint Your System Requirements*

4 IDENTIFY YOUR DATA POINTS

Now that you have a prioritized list of system requirements, what data will you need to capture to fulfill them? Identifying the data you need ahead of time will streamline the collection process by guaranteeing you're only collecting the information that matters most.

Reviewing any procedures from past inventories and current activities is helpful. This data may come from a variety of sources within your organization, including:

- Existing databases
- Paper files
- Memory of current employees
- Past work orders
- Spreadsheets
- Paper maps
- Internal and external reports
- Index cards

From these sources, determine the data your immediate team needs, the info you share with other users to meet organizational goals, and any additional data points you're not currently extracting, but may come in handy for future needs down the line.

Be sure you review existing information from previous inventories to see if it's still valid and should be pulled into your new inventory. Some of the data that was important in the past, may no longer be needed.

TIPS + TRICKS:

Key asset information may include:

- Identification of the asset
- Location and GIS data
- Features and geometrics
- Origin and reconstruct dates
- Maintenance activities and history
- Supporting images, videos

5 VERIFY YOUR DATA SOURCES

Once you figure out what data points you're looking for, it's time to determine where that information comes from. Hopefully, your existing data is already in a digital format and can be converted easily into your new system. If some of the data you need is currently on paper, your organization should decide if you will manually key the information into the system yourselves, or outsource the data entry to a consulting firm.

If you've identified crucial new asset data points, determine if collecting the data with your current team is your best option, or if you need to outsource it. Keep in mind, using current personnel will take away from their present tasks, and services to your constituents may suffer. On the other hand, outsourcing your data collection means you'll need to add another line to your asset management budget.

MODERNIZING GOVERNMENT WITH THE CLOUD

State and local governments are innovating for and with citizens. Whether through open data initiatives, public safety modernization, citizen service improvements, or infrastructure programs, governments are turning to Amazon Web Service (AWS) Cloud to provide the cost-effective, scalable, secure, and flexible infrastructure necessary to make a difference.

GET TO WORK

Looking for help identifying your required data and data sources? You're in luck—we've created a checklist.

View the checklist:
Open up *Worksheet 3: Verify Data Sources*

CASE STUDY

ARCHIVING & STORAGE

King County, WA saves $1 million in the first year after starting to use the AWS Cloud for archiving data.

LEARN MORE »

6 EVALUATE YOUR PROCESSES

Although your organization may have an outline for identifying, assigning, and performing activities—it's a good idea to reevaluate your practices before you implement a new asset management system. Wonder why? While your regular asset management activities are being completed on a daily basis, the documentation of these activities is often incomplete or entirely missing.

Take a critical look at your current methods for managing your assets. Identify the strengths you should build upon and the weaknesses you need to correct. From this evaluation, an improved process will be created by outlining workflows and best practices surrounding your asset data management.

While this may seem like a huge task, outlining your procedures will ultimately make your entire organization more efficient, effective, and productive. It will also save you a heck of a lot of time training new employees—after all, the directions they need to complete any task will already be outlined and ready for them to use.

GET TO WORK

To help you get started, we put together a list of questions that will help you document your asset management process.

View the list:
Go to *Worksheet 4: Evaluate Your Processes*

7 ESTABLISH YOUR TIMELINE

Your system implementation timeline is going to be unique—just like your organization. Your short and long-term goals, required data, employee skill level, and available budget are all going to impact your timeframe of the management system. Look back over all the information you gathered through your previous steps. This should help provide you enough direction to set a timetable for the rest of the implementation process.

Although timeframes will shift as the implementation progresses, defining milestone dates will keep you moving along. Items to keep in mind when establishing a timeline for your system include:

- **Get real:**
  Be realistic about your system goals. Start with a manageable system and plan for future enhancements.
- **Don't delay:**
  Limit the amount of time for initial data entry or conversion—this helps you avoid delaying the entire project.
- **Save room:**
  Allow some buffer time to accommodate for changes.

GET TO WORK

Don't start from scratch: we created a sample timeline to help you get the ball rolling. Check it out!

See the timeline:
Go to *Worksheet 5: Establish Your Timeline*

TOP 6 CHARACTERISTICS OF A STELLAR SYSTEM

Your team is managing millions—if not billions—of dollars in infrastructure assets every day. So you're going to want to make sure you select an asset management system that helps your team be more effective, efficient, and productive for your citizens. As you begin researching solutions, here's a few things to look for:

USER-CENTRIC DESIGN

Look for something that's easy to use and intuitive in its design. A clean, simple interface enables workers to concentrate on the task at hand, rather than muddle their way through a poorly designed system that makes their life harder. Remember, if your field professionals are frustrated with the tool, they're not going to use it.

MOBILITY

You're always on the move, so your system needs to keep up. To be efficient and effective, you need to seamlessly access data and tools in seconds, whether you're at the office or in the field. The right system should perform just as well—if not better—on your smartphone as it does on your computer. If a system looks like it would slow you down rather than speed you up, kick it to the curb.

CROSS FUNCTIONALITY

Your asset management system should meet city-wide needs. Cross-functional thinking, along with the communication and collaboration necessary for success, isn't possible with a system that creates data silos. Efficiency and data-driven decision making improve when every user has access—no matter their department.

ADAPTABILITY

Look for a system that is adaptable, flexible, and scalable. Don't just focus on your system needs right now—consider how things might evolve in the future. Use that knowledge to choose technology that can expand and grow with your team and the needs of your community.

INTEGRATION

For enhanced analysis and decision making, look for an asset management system that has seamless, two-way GIS integration with an industry leading solution. You should also be able to customize your maps to fit your day-to-day needs, save time, and increase efficiency.

DATA ORGANIZATION

Does the system make it easy to input, view, and find data? If not, look elsewhere. Quick, easy access to well-organized data, such as an asset's work and inspection history, empowers workers —especially those in the field— to make well-informed decisions.

5

ALL SYSTEMS GO

PERFORMING YOUR INITIAL INVENTORY

Want the truth? The most crucial aspect of any management system is still its data. Accurate data provides the foundation on which decisions are made, activities are scheduled, budgets are planned, and funding is justified. The basis of accurate, real-time data is a complete initial asset inventory.

If your data is incomplete or doesn't exist in an electronic format, you're going to have to gather that info manually. This means your internal team—or data collection vendor—must visit each asset, assign a unique identifier, and collect important information about it. Completing a manual inventory is a substantial undertaking—but the good news is that it doesn't have to be done all at once. Start with a few data fields or hone in on a specific group of assets, and add more over time.

REVIEW YOUR SYSTEM GOALS

We told you those system goals were important! Whether your data exists electronically or it needs to be collected manually, the first step to completing your initial inventory is to review the goals of your asset management system. Identify what information is needed and if it will be included in the initial inventory or added later on.

TIPS + TRICKS:

Cross training ensures your system will continue to function smoothly in the event of an employee absence or turnover. It will also help your employees view their tasks as a part of the larger asset management process.

IMPLEMENT YOUR TOOLS

Before you begin the initial inventory, install and familiarize your team with the tools, required data, and management system procedures. Training on the procedures and tools should be provided to all members of the team—not just those involved in the collection process.

Set up an empty software database that corresponds to your outlined system specifications. This includes developing record formats that contain the required information, determining attribute fields (e.g. street name), and building selection lists for attribute fields (e.g. street names that can be selected from a list).

Identifying a concise list of choices ensures your data will always be entered the same way, speeding up the inventory process and maintaining data integrity. Draw from existing system naming conventions to create these tools, and remember—lists can be added to or edited in the future.

BEGIN A PILOT PROGRAM

Get excited because with your database created and your team properly trained, you can begin the initial inventory process. Completing a pilot program ensures your system is good to go, without traveling too far down the wrong path. A pilot program limits the geographical area being tracked to confirm that you're on the right track before the system is scaled.

Select a pilot zone that is a good representation of your jurisdiction, and set clear boundaries—such as a housing subdivision. Provide your team with your selected data collection tools—maybe a smartphone loaded with your asset management system app—and begin collecting and entering data following your outlined procedures, of course.

Once the data is in the system, take a breather and review both your data accuracy and processes. Discuss the project with your team to figure out what worked with your pilot program and what should be improved. Make tweaks to increase effectiveness—such as deleting fields that are not providing useful data or adding new fields that are found to be necessary—and update your standard processes for the asset management system, if required.

Finally, based on your pilot project findings, revisit your system implementation timeline. The pilot project should have uncovered areas that may require more resources or time than you originally anticipated. Go back through and adjust as necessary.

TIPS + TRICKS:

Develop and print sample reports to ensure the correct information is being collected and can be easily shared with your key stakeholders.

PERFORM YOUR INITIAL INVENTORY

With your pilot complete, it's time to get your initial inventory underway! Instruct your crews to collect all the information identified. Inaccurate or incomplete info will result in a loss of data integrity that may affect management decisions in the future.

Even during the initial inventory process, your asset management system needs to include daily maintenance activities. Just think: it may take your organization months to complete your data collection project, but your team is still completing regular asset maintenance activities daily.

If you wait until the end of your data collection project to input these activities, several asset records will already be out of date—creating more work for your team. To compensate for new assets or changes to previously inventoried assets, a defined procedure should be followed to continue to maintain your data.

"Inaccurate or incomplete info will result in a loss of data integrity that may affect management decisions in the future."

MAINTAIN YOUR DATABASE

Your new "virtual inventory" must be kept up-to-date as much as possible to match the state of your actual "physical inventory." Monitoring your data on a regular basis is key to keeping your inventory current and your data-driven decisions spot on. Here are a few of our tips:

- **Checks and balances:**
  Perform routine checks on the database to check for any inaccuracies or inconsistencies.
- **Sharpen the saw:**
  Ongoing training for all individuals involved in the process of collecting asset data is essential. They should not only be familiar with the tools and procedures, but also with the importance of consistent and accurate data.
- **Can't stop, won't stop:**
  Your community's infrastructure is like a living, breathing environment. So, your data collection process is never truly complete. Any physical changes to an asset should be recorded into your asset management system.

CASE STUDY

INCREASING PRODUCTIVITY AND REDUCING COSTS WITH DATA

The City of Rosemount, MN reviewed their asset management system data and discovered they were inefficiently spending $35,000 a year to clean catch basin sumps. Since the work was assigned by region, sumps containing very little debris were needlessly cleaned while sumps with higher debris amounts were often skipped. With their mobile asset management technology in hand, the city established a data-driven maintenance schedule that has saved the city 1,500 staff hours and more than $80,000 in equipment costs over a five-year period.

LEARN MORE ABOUT ROSEMOUNT »

6

ALL IN A DAY'S WORK

HOW TO MAINTAIN YOUR SYSTEM

You've rolled up your sleeves and put a lot of hard work into planning, selecting, and implementing your new system. But, the most critical part of the process is your daily system maintenance and execution.

A database is an investment: it should be maintained just like any other piece of valuable equipment. Failing to maintain your asset information at its most current state causes your data to be inaccurate and—in some cases—useless, and the system will quickly deteriorate.

SYSTEM MANAGEMENT

Continuing to follow and enforce your outlined operating procedures will make it a whole lot easier to keep up-to-date infrastructure information. Commit to entering system updates on a daily—or at the very least, weekly—basis.

Here are a few data accuracy tips:

- Record all maintenance and inspection activities as soon as they occur.
- Capture any "forgotten assets" discovered during regular maintenance.
- Create an inspection cycle that will visit every asset during a specific period.
- Enter new records for assets as they're added to your network and immediately incorporate them into the maintenance schedule.
- Remove an asset from active duty when it is retired, and archive the information.
- Capture new info on your assets during regular maintenance or inspections, or as time permits.

"A database is an investment: it should be maintained just like any other piece of valuable equipment."

QUALITY CONTROL

Just like an accounting system, your asset management system should be audited periodically to make sure it continues to meet your specified objectives. Spot checks should be performed to guarantee your data is accurate and consistent.

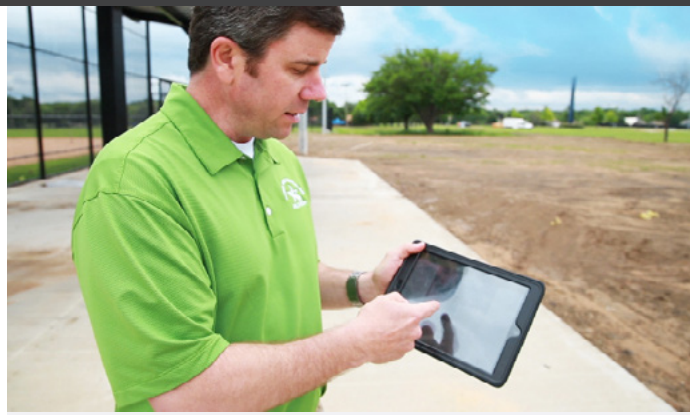
This spot check can include:

- Confirming "virtual data" against "physical data."
- Generating reports for the proper audit of your inventory.
- Checking data lists or libraries for duplicate or inconsistent data.

TRAINING

Training—or retraining—employees is essential to maintaining your system's efficiency. Training should focus on both your asset management system and the entire management process. This can involve reviewing and evaluating the procedures outlined for each person in your organization and training employees to make sure they are fully aware of all processes, procedures, and advanced features.

Training could involve a meeting to discuss the implementation plan with the dedicated teams, or a training class to make sure employees are using the tools in the most effective and efficient ways possible.



CASE STUDY

CITY OF ARLINGTON, TX

With new parks coming online, the City of Arlington slowly outpaced their resources and needed to uncover efficiencies to keep up. Could they accomplish more with less energy? Did they need to visit every park each day?

Putting their asset management system data to work, Arlington discovered smaller, less used parks could be cleaned once or twice a week without affecting citizen satisfaction. The team put a new, data-driven schedule into action that has helped them save 3,300 hours—or $60,000 in labor costs—in less than a year.

LEARN MORE ABOUT ARLINGTON »

CONSISTENT EVALUATION

High-performance governments never settle for "good enough." They're always examining their operations and looking for ways to become better, faster, and stronger for their citizens. Take a look at your system objectives and processes, and evaluate your system on a regular basis.

Ask yourself these questions:

- Is the system being used effectively?
- Does it continue to meet our established goals?
- Is it providing the necessary information?
- Have our goals changed since the implementation?
- Is there new technology available that would streamline or improve our process?
- Are there any bottlenecks we need to work through?
- Have all our employees been sufficiently trained on the system?

FUNDING

An asset management system is not a one-time purchase. It's an investment in the future of your community and the quality of life for your citizens. Your system tools and procedures must be maintained and supported through sufficient staffing and funding.

Be sure to include the following line items in your annual budget request:

- Additional data collection/data entry
- Asset inspections
- Software/hardware upgrades
- New software/hardware tools
- Technology assistance
- New employee training
- Current employee training
- Technical support
- User groups
- Technical conferences
- Industry workshops

LET'S DO THIS:

YOUR MAP TO SUCCESS

Your citizens are counting on you. The way your team approaches asset management directly impacts the quality of life of your small community. Luckily, with this ebook—and accompanying worksheets—by your side, you're well on your way to crafting a sound asset management strategy, identifying the ideal asset management system for your organization, and leveraging the latest technology to manage your assets effectively, deploy resources efficiently, and become more productive.

As you set off on your journey, use this checklist as a step-by-step map to success.

- ☐ Determine your key players.
- ☐ Define your system goals.
- ☐ Pinpoint your system requirements.
- ☐ Identify your data points.
- ☐ Verify your data sources.
- ☐ Evaluate your processes.
- ☐ Establish your timeline.
- ☐ Review your system goals.
- ☐ Begin a pilot program.
- ☐ Perform your initial inventory.
- ☐ Maintain your database.

LOOKING FOR MORE EXPERT ADVICE?

We're here to help—feel free to reach out with any questions or concerns at success@cartegraph.com or visit our website at cartegraph.com.

We look forward to connecting with you.

IF YOU LIKED ASSET MANAGEMENT BASICS YOU'LL LOVE THESE RESOURCES:

Thinking Beyond Asset Management

cartegraph.com/download/
beyond-asset-management-public-works-guide

READ THE GUIDE >

Three Norsemen of the Datapocalypse

cartegraph.com/webinar/three-norsemen-datapocalypse

WATCH THE WEBINAR >

An Introduction to High-Performance Government

cartegraph.com/download/introduction-to-high-performance-government

READ THE GUIDE >

ABOUT CARTEGRAPH

Cartegraph, headquartered in Dubuque, Iowa, empowers cities and counties to become high-performance organizations. They offer services and software to help local government agencies manage assets effectively, deploy resources efficiently and become more productive for the benefit of their citizens.

To build high-performance governments, Cartegraph uses a comprehensive, three-pronged approach that combines success coaching, expert consulting, and state-of-the-art software. Cartegraph produces web-based asset, work, and resource management tools to help agencies capture data, analyze it, and prepare for the future. For more information on Cartegraph and their high-performance government solutions and services, please visit cartegraph.com or call (800) 688-2656.

ABOUT AMAZON WEB SERVICES

For almost 13 years, Amazon Web Services has been the world's most comprehensive and broadly adopted cloud platform. AWS offers over 165 fully featured services for compute, storage, databases, networking, analytics, robotics, machine learning and artificial intelligence, Internet of Things, mobile, security, hybrid, virtual and augmented reality, media, and application development, deployment, and management from 66 Availability Zones within 21 geographic regions.

Millions of customers including the fastest-growing startups, largest enterprises, and leading government agencies—trust AWS to power their infrastructure, become more agile, and lower costs. To learn more about AWS, visit aws.amazon.com.

Cartègraph powered by aws

Phone 563.556.8120
800.688.2656

Email info@cartegraph.com

3600 Digital Drive
Dubuque, IA 52003
cartegraph.com