Medical Asset Management for Hospitals and Pharmaceuticals

Tracking healthcare equipment and improving performance for greater ROI
TABLE OF CONTENTS

The Healthcare Industry: An Overview 1
Medical Equipment Management Challenges 2
Automating Medical Asset Tracking 3
EZOfficeInventory’s Features for Healthcare 4
Executing Asset Checkout Workflows 5
Executing Irreversible Reaction Workflows 6
Executing Work Order Servicing Workflows 7
The Value Added by EZOfficeInventory 8
Concluding Thoughts 9

ABSTRACT

This whitepaper will talk about the challenges faced by the healthcare industry, and how Medical Asset tracking software features can help you overcome them. We will also outline some common healthcare workflows used by EZOfficeInventory customers to optimize Hospital and Pharmaceutical Asset management and increase their ROIs.
The Healthcare Sector: An Overview

With aging population on the rise, higher prevalence of chronic diseases and ever-increasing pollution levels, there is a need for the healthcare industry to expand constantly. In fact, global annual healthcare spending is projected to reach $8.7 trillion by 2020. Today, the industry has to manage a large and varied list of Medical Assets and Inventory, with the intentions of catering to its growing demand.

The Complexity of Medical Assets

Technology has revolutionized modern healthcare so much so that data-centred technology is now being used to diagnose and treat illnesses, and deliver care to patients. Healthcare has evolved from a handful of clunky Medical Assets in hospitals to advanced nanocellular technologies that detect and cure cancerous growths. Listed below are some key categories of equipment that constitute a standard Medical Inventory, categorized according to the way they are best managed.

1. Diagnostic and Supporting Equipment

This includes a large variety of diagnostic assets, such as ECG, X-ray, ultrasound and EMG machines, dental chairs and spirometers. This also consists of supporting equipment like patient beds, computers etc. These are normally tracked individually and may require regular service sessions. These, therefore, have unique Asset tags that can quickly identify custodianship and ward or unit location.

2. Laboratory and Surgical Instruments

Laboratory items may include beakers, walk-in fume cupboards and weigh scales. Surgical instruments can be surgical tools, pacemakers and vascuthersms. Hospitals and pharmaceuticals track surgical and laboratory equipment in bulk. This helps Administrators easily check larger quantities out to different departments.

3. Medicine, Chemicals and Other Consumables

Healthcare requires consumables in large quantities. These could be items like medicines, surgical disposables, cannulae, gloves, biohazard bags, syringes, cleaning supplies, organic chemicals and more. These are also tracked in bulk, but are consumed upon checkout to different departments or units. Being constantly used up for treating patients, they need to be replenished on an efficient basis.
Equipment Management Challenges in the Healthcare Industry

Given the wide range of equipment hospitals and pharmaceuticals have to deal with, Asset management across health institutions can be a complex and expensive process. Here are some equipment management challenges faced by the healthcare industry today.

**Overnight Shipping:**
Overnight shipping costs of emergency items due to frequent Asset stockouts can have a detrimental impact on a hospital’s revenue. With a better Asset management solution, you can pull down instances of stockouts and eliminate these costs.

**Drug Shortages:**
Drug shortages are inescapable in the healthcare industry, forcing hospitals to purchase more expensive alternatives or disrupting their entire supply chain. A technology that gives early notifications or alerts on long run drug shortages can help healthcare institutions effectively monitor and manage foreseen and some unforeseen drug shortages.

**Data Inaccuracy:**
Healthcare institutions deal with lots of data regarding patients, drugs and treatment methods. Inaccurate data collected from manual methods can give hospitals a wrong overview of their capital requirements and take a toll on their performance. A solid Asset management solution that shows actionable data so hospitals can better assess their requirements and performance is the key.

**Lack of Integration:**
While healthcare facilities merge with growth, their supply chains often remain siloed. This results in inconsistent workflows that eventually impact the bottomline. It is important to integrate supply chains and centralize purchases from all departments with good Asset management solution.

**Poor Workflow Design:**
Disconnected supply chains from different departments bleed into unnecessarily duplicated workflows. This simply takes up more time and resources. Automating and integrating siloed tasks with Asset management technology can free up human resources and streamline the entire workflows of a hospital.
Automating Medical Asset Tracking

Health sector stakeholders are now shifting to smart health to offer more technology-enabled and patient-centred healthcare. Treatments are being digitized. Patient care processes are tracked from diagnosis to medication stage to provide personalized therapeutic treatments.

With myriad sources of healthcare data to manage and a need for expediting advanced medical workflows, it is no surprise that the medical industry is now ripe for the introduction of an automated Asset tracking solution that can alleviate a lot of its Asset management challenges. Proper Asset management can help remove inefficiencies related to Asset procurement, tracking, usage and maintenance, all from a centralized platform. This not only lowers overhead costs but also improves workflow transparency - two factors that are extremely important in the healthcare sector. Switching over to smart health is only feasible if all processes from patient care to hospital Asset management are duly automated.

EZOfficeInventory is a medical Asset tracking platform tailored to the needs of evolving healthcare sector. It enables hospitals and pharmaceuticals to monitor, organize and report on their Assets and Inventory with ease. This means uninterrupted care delivery to patients, better data management, more efficient staffing, and seamless integration with new technologies to offer a digital patient experience. Better Asset management also translates into the stakeholders investing more money and effort in ground breaking medical cures.
EZOfficeInventory’s Features for Healthcare Industry Workflows

**Asset Lifecycle Management**
Manage the entire lifecycle of your hospital Assets and Medical Inventory from procurement to retirement. Add and track Purchase Orders, vendor information, maintenance histories and lifetime costs.

**Check-in and Checkout**
Quick item label scans via the mobile app allow you to check out surgical tools and medical consumables to hospital staff for use.

**Locations**
You can distribute Assets across different departments and hospital wards and track their usage by location. Sub-location feature allows you to keep tabs on warehousing of medicines and pharma chemicals.

**Groups and Subgroups**
With this feature, you can classify Assets into groups and subgroups, for instance, respiratory or circulatory devices for use by different specialists.

**LDAP Server Integration**
You can enable employees in your healthcare departments to access the EZOfficeInventory account with their LDAP credentials.

**SAML SSO**
With SAML SSO, you can bolster security and simplify the login process by giving your hospital staff a single URL to sign in via the active directory of your hospital.

**User Listings**
Users from different departments can be sorted into categories – such as Pediatrics and Obstetrics - with distinct groups of equipment based on the types of items they need.

**Mass Retirement of Assets**
Assets that are no longer needed for use or are consumed during treatments or medicinal formulation can be retired from database of available Assets. Their history still remains in the system for reporting purposes.

**Work Order Management**
Work Orders can be created for each task, and relevant tools and staff member can be assigned to the Work Order. This allows you to track staff performance and schedule vital medical treatments effectively.

For more features, click [here](#).
Asset Checkout Workflow

Here’s an example of the Asset Checkout Workflow used by some of our customers. This could be useful if you have different equipment for use by different departments. As an example, below we reference a pharmaceutical company that tracks its lab equipment across 18 Locations using our software. This is how they would use EZOfficeInventory:

1. Project Manager adds Assets like IT and lab equipment into the system.
2. Assets are grouped by their usage in different laboratories for manufacturing separate drugs.
3. Each Group of Assets is visible to relevant R&D specialists and chemists only.
4. Each chemist checks out requisite lab equipment for an indefinite period as per his/her need.
5. After use, the lab equipment is checked back into the system by the Staff User (chemist).
6. When equipment is not in use, its Default Location is changed to Storage Location (with nested sub-location).

With this, Items going to different laboratories can be monitored separately, but centrally. This not only makes processes a lot more streamlined, but also ensures that each lab has a separate pool of Items that they are individually accountable for.
User Listings by Clients Workflow

Here’s an example of the User Listings by Clients Workflow used by some of our Customers. This could be useful if you manufacture drugs for multiple pharmaceutical clients. As an example, below we reference a drug research organization that tracks organic chemicals to design enzyme inhibitors for cancer cure. This is how they would use EZOfficeInventory:

1. Senior scientists (Administrators) add Items like organic chemicals and PBMC cells into the system.
2. These Items are grouped by their usage for different clients e.g. Pfizer, Eli Lilly etcetera.
3. Items are stored together in refrigerators/cabinets; their Locations nested by chemical groups.
4. Each Member is grouped into a User Listing by the name of the client they are working for.
5. Members in each User Listing have access only to the Items grouped for a certain client.
6. Items in each Group are checked out to the relevant User Listing for duration of the drug manufacturing process.
7. Used up chemicals and cells are mass retired after drug manufacture, whereas the lab equipment is checked back into the system for scheduled repair.

This kind of workflow helps segment workflows of healthcare organizations by their clients. They are better able to focus their efforts on a single Customer and work on their projects more effectively.
Servicing by Work Orders Workflow

Here’s an example of the Servicing by Work Orders Workflow used by some of our Customers. This could be useful if you sell diagnostic medical equipment to hospitals and receive their Servicing Orders. As an example, below we reference a healthcare technology solutions provider that manufactures and sells surgical tables and modular diagnostic equipment to hospitals. This is how they would use EZOfficeInventory:

1. The Sales team makes a contract to sell Items like operation tables and surgical lights to hospitals.
2. Items to be sold are added into the system; their Location set to destination hospital’s Location.
3. In case of malfunction, faulty Items are returned by the hospital’s management.
4. These faulty Items are checked out to Service Managers or Service Personnel.
5. A Work Order is associated with each faulty Item to track the progress of its maintenance.
6. After repair, Items are checked back into the system.
7. Serviced Items are then checked out to the relevant hospital they were sold to.

As you can see, this kind of workflow helps monitor staff performance and keep tabs on the servicing of your Medical Inventory. This makes sure your customers are fully satisfied and you provide them with swift repair solutions.
According to WHO, even hospitals with straightforward operational needs and only a handful of complicated Assets need effective healthcare Asset management.

The Value Added by EZOfficeInventory

- **Increase Asset Visibility**
  With EZOfficeInventory, hospital officials know where each piece of medical equipment is at all times. Your staff spends less time searching for equipment and more time taking care of patients. Instances of theft and misplacement also decrease with more Asset visibility.

- **Maintain Hospital Sanitation Standards**
  Sanitation procedures of medical equipment and tools can be tracked by the Work Order module of EZOfficeInventory. You can keep tabs on sterilization, status and usage of hospital to pull down the spread of infections and contaminants by keeping your equipment clean.

- **Improve Maintenance Practices**
  EZOfficeInventory stores details on the entire lifecycle of your medical Assets. This helps management to schedule predictive maintenance for items before actual breakdowns occur. Proactive real-time alerts on inspection help reduce equipment downtime and ensure that there are no roadblocks to quality healthcare.

- **Environmental Monitoring of Medical Inventory**
  With EZOfficeInventory, you can clock in environmental specifications of sensitive chemicals or drugs. You can then constantly monitor the environmental conditions of hospital wards, labs and storage shelves to ensure any Medical Inventory doesn’t expire before its stipulated expiry date.

- **Assess Performance**
  Generate Asset utilization reports with EZOfficeInventory to see how your Assets are deployed on a daily basis within the hospital. Management can utilize this detailed information formulate action plans and minimize inefficiencies and costs.
The healthcare industry is growing at a rapid rate. The recent convergence of health and technology has presented new opportunities for the industry to complement this expansion. At the same time, Asset tracking remains a significant challenge. Considering the quantity and variety of equipment the healthcare industry has to deal with, a robust and easy-to-use Asset tracking solution is the need of the hour to iron out operational workflows and increase Asset accountability. EZOfficeInventory provides all the features necessary for the healthcare sector to increase Asset visibility, maintain health and sanitation standards, and improve equipment maintenance practices. This helps hospitals and pharmaceuticals save time, money, and resources, enabling them to provide quality healthcare to patients.

If you want to learn more about how EZOfficeInventory can help your business execute best practices for Asset management, go to the next page for more details.
We launched EZOfficeInventory in 2011 to help equipment intensive organizations increase efficiency and reduce costs. Together with thousands of our customers, we’ve developed and refined best practices in Asset management. By removing technology related inefficiencies and enhancing employee productivity through the optimal usage of Assets, EZOfficeInventory enables businesses to focus on core strengths. Armed with this knowledge, we’ve served all kinds of businesses – from enterprises to SMBs, and from non profits to industry leaders!

About EZOfficeInventory

Get started with Asset Management today.
Try out our free 15 day trial – no credit card required!