Committing to the journey toward zero errors and zero waste
Medication: the most widely prescribed therapy

Healthcare systems are under intense pressure to manage cost without sacrificing safety. As your most widely prescribed therapy, medication has a significant impact on every key outcome—your margins, quality of care and patient satisfaction.

In an ideal world, your medication use process would have zero errors and zero waste. But getting there is an incredibly complex journey. It takes an average of 30 steps to get one medication to a patient.¹

Big investments for small improvements

To manage information across these 30 steps, health systems have invested billions of dollars in electronic health record (EHR) technology. And your electronic medical record (EMR) has likely overcome many challenges with order entry and barcoding. Still, it hasn’t been enough. Even with computerized physician order entry (CPOE) and bar code medication administration (BCMA) and other pharmacy solutions, the industry has barely made a dent in medication errors.

According to industry experts like Dr. David Bates, the problem lies in the gaps between these isolated systems and processes. As long as these organizational gaps exist at the same time acuity and care complexity rise, your risk exposure to medication errors, wasted cost and decreased patient satisfaction will only continue to increase.

For all the technology that healthcare systems have thrown at the problem of medication errors, medication errors have decreased by only 7% industry-wide.²

Throughout a typical day, your pharmacy compounds and delivers hundreds of medications, but nurses often can’t find them. One study at a thousand-bed hospital showed that nursing calls the pharmacy about missing medications 400 times a day.³ As a result, your caregivers’ time is consumed with handoffs and workarounds that take their focus off patients. The most recent stats show that nurses spend more than a third of their time on unnecessary tasks like searching for things and waiting.⁴
It’s not just about technology—it’s also about clinical practice

Your EMR is an essential tool, but it can’t solve your medication management challenges on its own. That’s because reducing errors and waste isn’t just an information problem or a technology automation problem. Instead, think of medication management as a systemic challenge that crosses over multiple disciplines. That means you need to connect islands of technology into one comprehensive approach to manage medication logistics and care delivery, and link this with your EMR.

What if you could:

- Apply forcing functions to practice components where variation is dangerous?
- Consolidate medication management into one connected system?
- Anticipate medication needs and flex quickly to accommodate them?

If you could, you’d be able to commit to the journey toward zero errors at the lowest possible cost. While you’ll never arrive at zero, BD can help you move ever closer to that goal.
That’s why health systems are turning to BD

The answer starts with the BD HealthSight™ platform, our unique combination of common infrastructure, workflow applications, advanced analytics and practice improvement services for managing medications across your health system. You’ll use the BD HealthSight™ platform to connect your core BD products with each other and with your EMR.

Address your process gaps with the BD HealthSight™ Platform

Medication management is complex, manual and error prone. You need to expose and bridge the gaps in this critical process. That’s where the BD HealthSight™ platform comes in:

BD Connected Medication Management

![Diagram showing the integration of BD Pyxis™ Logistics, BD Pyxis™ IV Prep, BD Pyxis™ C II Safe, BD Pyxis™ ES System, BD Pyxis™ ES Refrigerator, and BD Alaris™ System with BD HealthSight™ Platform and EMR.]

- **Pharmacy**
- **Patient care**
- **Patient**

- **Inventory optimization**
- **Diversion management**
- **Medication safety**

**Operations dashboard** with real-time views

**Enterprise master data management** enabling analytics and simplifying formulary management
Transforming medication management

Your ultimate goal is to make medications available when and where your patients need them—while minimizing errors and waste. To get it right, you’ll need to overcome three key challenges.

Challenge:
Unwarranted practice variations

Every patient deserves the same level of care, but due to patient factors or clinical practice variation, patients do not always experience the expected outcome from medication therapy. That variation is especially dangerous when it comes to infusions. The problems start when disconnected systems and processes force you to create manual workarounds. Technicians manually measure and compound medications in the clean room. Pharmacists visually confirm them. Nurses key orders into pumps at the bedside. Each step leaves you vulnerable to mistakes that can cause life-threatening errors.

The most costly and serious medication errors—56%—are IV-related, and 61% of these errors are life-threatening.5

The BD solution:
Move infusions safely and seamlessly from physician order to pump

Because BD applies forcing functions where variation is dangerous, you can reduce everything from unintentional errors to unsafe practices and narcotic diversion. With our end-to-end infusion safety system, you can standardize IV therapy across your hospital. Then you’ll integrate the BD Alaris™ system with your EMR to prepopulate infusion pumps with orders and accurately document the status. And you’ll use the BD HealthSight™ viewer to monitor urgent medication needs across nursing and pharmacy.

Using BD Pyxis™ IV Prep (formerly BD Cato™ Medication Workflow Solutions) can increase detection of drug preparation errors from 0.01% to 7%.6
**Challenge:**
Interrupted and wasteful processes

Running your hospital efficiently and safely requires tight coordination. But it’s difficult to streamline medication management when nurses and pharmacists are interrupted every few minutes. Plus, the medication information they need exists in a complex set of systems and spreadsheets—or even other employees’ heads. Even when you realize that you’re carrying too much inventory or that nurses are wasting too much time locating medications, it’s often a struggle to pinpoint exactly where the problems lie and how to fix them.

Nurses administering medications and pharmacists and technicians dispensing medications are distracted and interrupted as often as once every 2 minutes.⁷

**The BD solution:**
Manage your medication logistics as a single system

With the BD HealthSight™ platform, you can seamlessly connect your BD technologies, including BD Pyxis™ technology and the BD Alaris™ system. You’ll use BD Pyxis™ logistics (formerly Pyxis™ Pharmogistics™ software) to organize and automate your inventory, and BD HealthSight™ data manager to manage multiple formularies through one tool. And depending on your vendor, you can integrate your EMR with the data from your BD medication management technologies. By simplifying how you manage medication logistics, you’ll improve efficiency and medication availability across the care continuum.

Because of the interoperability of BD, nurses in one case study spent 30% less time removing medications and 32% less time on morning medication passes per patient.⁸
Challenge:
Constant fluctuations

Any industrywide change, such as payment reform, Affordable Care Act (ACA) amendments or the Hospital Consumer Assessment of Healthcare Providers and Systems (HCAHPS), can wreak havoc on how you manage medications. It’s even harder to keep up when these changes are all happening at once. You also need to adjust quickly to prescribing changes, patient movement, seasonal demands and manufacturing shortages. The slower the reaction, the bigger the problems get. For example, inventory shortages often create conflicts between nursing and pharmacy staff, while potentially leading you to overspend when you need a quick infusion of stock.

Buyers spend 3 to 4 hours per day on pharmacy purchases, reconciling medications and stocking shelves.9

The BD solution:
Anticipate and adjust to dynamic medication needs

With inventory optimization analytics and automation from BD, you can manage inventory dynamically with minimal intervention. That way you can decrease medication waste and carrying costs. You’ll also use BD HealthSight™ software to track medication adherence after discharge to reduce readmissions and improve outcomes. And by partnering with our BD HealthSight™ Practice Improvement Services Team, you can apply the right data to make your medication management practices smarter over time.

Near real-time connectivity between the BD Pyxis™ Dispensing System and BD Pyxis™ Logistics software helped decrease the number of stockouts by 80% at a local community hospital.10
Why BD?

When you partner with BD, you can apply clinical information from the EMR to the moments when medication logistics and clinical care intersect. Then you don't have to choose between cost reductions and safety improvements—you can do both. You'll use the BD HealthSight™ platform to make medication management safer, simpler and smarter.

Safer:
Detect and address medication safety risks before they reach the patient

Simpler:
Simplify how you manage medication logistics across the care continuum

Smarter:
Make your medication management practices smarter and more flexible

To begin the journey toward zero errors and zero waste, visit mms.bd.com