# DIGITIZATION CHANGED HOW WE DRIVE. ARE CONNECTED DRUG LABELS NEXT?

By Swami Subramanian April 10, 2024

In today's tech-driven world, connected cars steal the spotlight with autonomous driving and an impressive array of safety features as they communicate with other vehicles and their surroundings. Yet, amidst this excitement, a quieter revolution is underway—one that is more critical to our well-being: the rise of connected drug labels.

Digitization has emerged as a transformative force in the pharmaceutical-healthcare ecosystem, just as it has the automotive industry. The digital revolution has led to innovations in various aspects of drug development, manufacturing, distribution, and patient care.

In essence, connected drugs epitomize the convergence of technology and healthcare, promising to redefine patient care and treatment outcomes. They use smart labels and digital technology to provide real-time monitoring of medication

usage, enhance patient safety, and improve adherence rates.



As we navigate the future of healthcare, let us not underestimate the transformative power of connected drugs in shaping a healthier and more connected world.

## Three Ways Connected Drugs Revolutionize Our Well-Being

- 1. **Patient Safety:** Connected drug labels can help prevent medication errors and adverse drug reactions, reducing the risk of harm to patients.
- 2. **Medication Adherence:** Connected drug labels can improve patient compliance by providing reminders and tracking medication usage.
- 3. **Healthcare Outcomes:** Connected drug labels enable personalized healthcare by providing real-time monitoring and tailored treatment plans.

### At the Intersection of Safety and Health: Connectivity

## **Connected Cars**

- Enhance the driving experience and provide convenience to drivers.
- Features include GPS navigation, entertainment systems, and connectivity with smartphones.
- Improve safety, optimize fuel efficiency, and enable autonomous driving.



# Connected Drug Labels

- Prioritize patient safety and medication adherence and improve healthcare outcomes.
- Features include real-time monitoring, dosage reminders, and drug interaction alerts.
- Prevent medication errors, improve patient compliance, and enable personalized healthcare.

#### Potent Remedy for Adverse Reactions

Adverse drug reactions (ADRs) pose a substantial challenge, with hundreds of thousands of cases reported annually (https://www.ncbi.nlm.nih.gov/books/NBK599521/). ADRs pose the biggest threat to patient safety,

" Adverse drug reactions pose the biggest threat to patient safety, and connected drug label is a potent remedy to overhaul existing practices."

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and digitization is a potent remedy to overhaul existing practices. Healthcare providers and manufacturers will have real-time data and robust analytics. Through the seamless integration of digital technologies, healthcare professionals gain the ability to proactively identify potential risks to their patients, fine-tune treatment approaches, and mitigate adverse outcomes. Manufacturers can use the same information to educate the general public on adverse reactions through a standardized platform.

Just as connected cars seamlessly integrate with other vehicles on the road, connected drug labels serve as more than just containers for pills—they are gateways to a wealth of healthcare resources and support. Together, patients and their healthcare providers ensure compatibility with their current treatment regimen and manage potential drug interactions. This proactive approach to medication management can significantly reduce the risk of adverse reactions and

improve patient safety. Moreover, connected drug labels serve as a bridge between patients and their healthcare providers, enabling up-to-date information and access to personalized medication information. This streamlined communication can lead to more effective care coordination and better treatment outcomes.

#### Medication Adherence from Communicating with Patient

Most importantly, connected drug labels empower patients to take control of their health by providing interactive, language-agnostic information. Much like the intuitive interfaces in connected cars, these labels offer easy access to comprehensive drug information, dosage instructions, and side-effect management tips in the patient's preferred language.

Connected drugs are set to empower our journey of life, with most of the global population poised to benefit from them in a matter of a few years.

**In conclusion**, connected cars make driving safer and more convenient, and the importance of connected drug labels is just as significant. As we embrace the future of healthcare, let us remember that our well-being is more important than our mobility. Connected drug labels are not just a convenience—they provide better health outcomes and a longer life.

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