

基於無線射頻識別技術的藥物管理系統 RFID-based Drug Management System (DMS)

就藥物安全的重要性,利用無線射頻識別技術提高醫療服務的質素 Enhance the quality of medical service by focusing on the importance of drug safety using RFID technology

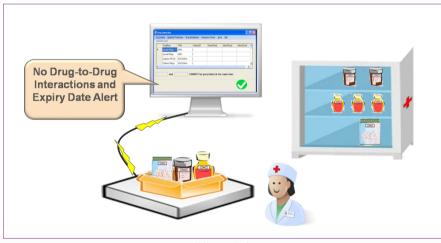
隨著社會不斷發展及進步,市民對醫療服務的質素和要求亦不斷提高。因此,每當有新的醫療事故發生,都會引起社會各界的廣泛報導、迴響及討論。近年新增的醫療事故中,頗大部份都是源於藥物管理的過程出問題。有見及此,理大研發了一套基於無線射頻識別技術的藥物管理系統。該系統應用於藥物補給及分配的程序,幫助監察藥物的調配運作和有效提升藥物調配的準確度,除了可減少因藥物分配時出錯而引致病人安全受威脅外,更可改善整套藥物系統的運作及藥物管理的效率。



藥物管理系統 Interface of RFID-based Drug Management System



藥物補給程序 Drug Replenishing Process



藥物分配程序 Drug Dispensing Process

A number of recent cases involving medication errors raise considerable public concern and press attention. Our researchers realized the important of drug safety and observed that most mistakes occurred during management processes. Therefore, the RFID-based Drug Management System (DMS) is proposed to modify clinic operations by tracking drugs throughout the replenishing and dispensing processes. It is used to enhance drug safety and patient safety, as well as to improve efficiency and effectiveness of drug management.

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特色與優點

- 偵測藥物是否置於正確的藥瓶內
- 提供即時藥物資料及照片以便識別藥物
- 發出過期藥物警報及藥物禁忌警報
- 促進醫療機構內的藥物管理流程

應 用

- 醫療集團、診所
- 藥廠、藥房
- 醫院

獎項

- "Gold Award" of the "Most Innovative EPC/RFID Application" for the Hong Kong RFID Awards U-21 RFID Awards 2010 (Postgraduate Stream)
- "Silver Award" for the Hong Kong RFID Awards U-21 RFID Awards 2009 (Undergraduate Stream)



Hong Kong RFID Awards U-21 RFID Awards 2010 & 2009

Special Features and Advantages

RFID-based Drug Management System (DMS) can:

- Detect whether the drugs are put in the correct container
- Supply users with real-time drug information and images of drugs
- Issue alerts for drug expiry dates, contraindication and interaction
- Improve drug flow within medical organization

Applications

- Medical Group, Clinic
- Pharmaceutical Factory, Pharmacy
- Hospital

Awards

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