中文摘要

本研究主要目的在結合網際網路與資訊技術發展一套無線健康 照護系統,透過GPS、GIS與GSM的整合,系統可以即時掌握受照顧 個案的最新位置,並透過通報派遣的機制,在黃金24小時內找到走失 的老人。

本系統主要是透過個人衛星定位追蹤器,提供主動式緊急救援,並藉由資訊平台整合包括全球行動通訊系統(GSM)、整合封包無線通訊服務(GPRS)訊息處理、地理資訊系統(GIS)圖資分析以及資訊服務管理功能,除了具備個案基本資料、協尋人基本資料的編輯和管理功能外,並能將老人走失時之地理位置、座標、街道地圖、體態描述、老人照片等關鍵訊息,立即傳送到家屬和相關協尋志工的行動通訊裝置,如手機(Mobil)、個人數位助理(PDA)或筆記型電腦(NoteBook)等設備上,達到比傳統方式更為有效率的協尋機制。

本研究能有效改進傳統透過電視廣播、路口張貼海報的被動方式, 提供即時快速的主動協尋模式,以期提升走失個案的尋獲率,進而降 低死亡率。

關鍵字:衛星定位系統、地理資訊系統、行動通訊系統、失智症 英文摘要

The purpose of this study was developed a healthcare system via combine Internet and information technology. Through integration of GPS, GIS and GSM, the system can locate the cared objects and find the lost old men or women by means of the mechanism of circular dispatches.

The system can offer active emergency aid through personal satellite positioning tracer and by means of integration of information platforms including GSM, integrate information handling of GPRS, analyses of graphic information and function of managing information services. In addition to function of edition and management of background information of objects and people who offer to look for the lost men or women, it may also immediately transmit key information, such as geographical location, coordinate, map of streets, descriptions of posture and photo when the old man or women got lost, to mobile communication devices, such as mobile phones, PDAs or notebook, of relatives and volunteers who offer to help look for the old men or women. The mechanism is more efficient than traditional way for finding the lost old man or woman.

The study may effectively improve passive traditional way of broadcasting and pasting up posters in somewhere of intersections and offer an instant, quick and active people-finding model. It could enhance rate of finding the lost men or women and further to reduce the mortality.

Keyword: GPS \cdot GSM \cdot Dementia