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Handhelds: A cure for illegible prescriptions?

Personal digital assistants can help you write and process prescriptions more efficiently and reduce the potential for errors. Our expert reviews the benefits and drawbacks.

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Those stale jokes about a doctor's poor penmanship are no laughing matter when it comes to writing prescriptions.

Prescription errors are a common cause of adverse patient events.[1] Illegible handwriting can lead to misinterpretations of dosage, drug name, or abbreviations. Imagine the implications for a patient with bipolar depression whose pharmacist interprets "Lamictal" as "Lamisil" on your prescription.

Replacing your Rx pad with a Palm or Pocket PC-both of which have prescription writing, printing, and processing capacities-may help you prevent such errors.

WHY A HANDHELD?

Machine-generated text usually is more readable than handwritten copy, but use of handhelds can also make prescription writing more efficient and secure.

A tap on the screen can pull a patient's name from a database directly into the prescription. With a few more taps, you can access a list of the patient's current medications and renew them without changes. A drug reference program allows you to check for drug-drug interactions.

To add a prescription, simply type the first letter and choose from a menu of drug names; the program narrows the choices as additional letters are typed.

Prescription-writing programs for handhelds also offer links to health plan formulary databases, so you can immediately find out whether a medication is available to the patient. This can eliminate time-consuming phone calls from the patient or pharmacy and discussions with pharmacy benefits managers. The patient also will appreciate getting needed medications with no hassle.

You can print out the prescription via the handheld's infrared or wireless port. This will help you prevent forgery, since a printed prescription is harder to forge than a handwritten one. It is extremely difficult to align a printed document in order to add or correct existing text.

By connecting the handheld to your desktop computer, you can fax prescriptions directly to the pharmacy. Entering all prescriptions into the handheld and sending them in bulk at day's end can save you significant time. To do this, you must create a database of pharmacies used by your patients and enter it into the handheld's fax software.

Cellular phone networks and wireless Internet access can also facilitate handheld transmissions. Companies offering these options typically have the prescription sent to their electronic warehouses, then to the designated pharmacy. These transmissions are expedient and safe, but users should make sure that they conform to the Health Insurance Portability and Accountability Act of 1996. Users face civil penalties for failure to use these adopted standards and criminal penalties for wrongfully disclosing confidential information. Violators can be fined up to $25,000 and face as much as 10 years in prison.

CAVEATS

Use of handhelds entails hardware, software, and monthly service costs. Most handhelds cost around $300, with the software and service totaling around $50 per month. Several prescription solutions are on the market (See “Handheld options for writing prescriptions”) and they vary in terms of hardware compatibility, software interface, and mode of transmission. For example, ePhysician is available for Palm OS devices, but transmissions must go to the ePhysician server before they are relayed to the pharmacy. iScribe is available for Palm OS, but prescriptions must be printed on specialized paper with preset perforations.

As mentioned, fax-based transmission lets you send prescriptions en masse, but this makes it difficult to confirm that a particular faxed prescription has been received. Worse still, if the handheld device fails, all prescriptions in storage would be lost. It is better to send fax-based prescriptions as often as possible or back up the information during the day.

Pharmaceutical benefit management organizations have begun purchasing handheld-compatible prescription companies. While this could expedite claims processing for handheld users, tighter controls on out-of-formulary drug use could result. The number and types of prescriptions can be tracked, making it easier for administrators to spot non-formulary prescriptions. The impact this will have on psychiatry remains to be seen.

Finally, because both computer technology and the health care industry are constantly changing, a prescription writing solution can become obsolete within a couple of years. Specifically, when health care companies merge, some products are discontinued. For example, when Salu medical communications purchased ScanRx, the latter company’s software upgrades were stalled and continuity of service to existing customers was broken.

THE FUTURE

Technology is addressing the need to reduce prescription errors in other ways.

Many hospitals use bar-code scanners attached or built into handhelds to ensure that medications reach the right patients. This capability could one day reach the practice mainstream.

Voice recognition software may one day allow physicians to dictate prescriptions onto the handheld, but will require voice imprint recognition for security.

HANDHELD OPTIONS FOR WRITING PRESCRIPTIONS

Palm OS

Bluefish Wireless

iScribe

ePhysician

Palmscription

Pocket PC OS

Scriptlynx

Pocketscript

Allscripts

Doc-U-Scrip

If you have any questions about these products or comments about Psyber Psychiatry, click here to contact Dr. Luo or e-mail to Current.Psychiatry@dowdenhealth.com.

Disclosure:

Dr. Luo reports no financial relationship with any company whose products are mentioned in this article. The opinions expressed by Dr. Luo in this column are his own and do not necessarily reflect those of CURRENT PSYCHIATRY.

REFERENCE

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