# The Safety Code Initiative

## Putting personalized medicine into the pockets of patients


### Why you should care

The efficacy and safety of medications for individual patients can be better predicted when data about essential *pharmacogenes* of patients are known. Pharmacogenes are genes that are responsible for the metabolism, transport and effects of many common medications.

**The goal of the Safety Code initiative is to make data and clinical guidelines about these pharmacogene sand other safety-critical patient traits easily available for all patients in all health care settings.**

### How it works

1) A patient carries their Safety Code with them and hands it to a health care professional when asked for it.
2) When prescribing a new medication or modifying existing prescriptions, the health care professional can scan the Safety Code with a common smartphone and see recommendations for drug dosing and drug choice based on the individual pharmacogenomic markers of the patient.

### Quick Facts

→ **Essential pharmacogenomic data of a patient are captured in a two-dimensional barcode ('QR code').** Apps for reading QR codes come pre-installed on most devices (e.g., 'Google Goggles' on Android phones), or can easily be installed from app stores. The QR code leads to a web page that gives recommendations based on up-to-date clinical guidelines.

→ **Privacy aware: All data are inside the QR code and remain anonymous.** No central database is required; patients have full control over their data just like they have control over the contents of their wallets. Optionally, client-side decoding without web access is possible.

→ The system currently contains **400 guidelines** for more than **60 pharmaceutical compounds** based on **60 pharmacogenes**. The system is based on guidelines issued by the committees of the *Clinical Pharmacogenetics Implementation Consortium* and the *Dutch Pharmacogenetics Working Group*, the leading international groups in clinical pharmacogenomics.

→ **The system is openly available and backed by an international team of experts.**

**Visit http://safety-code.org to find out more**

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