

Design for Patient Safety

Safer medical equipment: Rethinking visual language on medical products

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Background

- Reduction of error is a key issue in patient safety
 - Cost to patients
 - 10% of patients
 - 6% permanent impairment
 - 8% fatality
 - » 50% avoidable
 - Cost to NHS
 - Finance
 - Staff

Devices and Users

- Devices
 - Complex
 - Multifunctional, software driven
 - Range
 - Manufacturers, models, devices
- Diverse Users
 - Expertise, experience, training
- Range of Settings
 - Ward, theatre, ambulance, home

Symbols

- Extensively used
 - International market
- Increasingly used
- Standards
 - Design and testing

- Effective? Valid? Understood? Application dependent?

Questions to answer

- How and what devices are utilised?
- How do clinicians engage with devices?
- What symbols are used?
- How can this engagement be improved?
- How are symbols interpreted?
- How can they be improved?

Expectations

- Understand context
- Understand users
- Understand standards and test processes

Potential projects

- Develop a set of guidelines for graphic interfaces
- Create a completely new interface for a device.
- Take an existing device and improve it.
- Create a range of example devices.