

Help patients take medicines safely

Last week the National Patient Safety Agency published the first analysis of patient safety data in England and Wales. **Tom Moberly** looks at the report's findings on incidents involving medicines and the role pharmacists are playing in helping to reduce them

The National Patient Safety Agency is responsible for collecting and appraising information to promote patient safety in England and Wales and for implementing the National Reporting and Learning System. Last week it published its first analysis of patient safety incident reports.

"Building a memory — preventing harm, reducing risks and improving patient safety" analyses the 85,342 incident reports that the NRLS received between November 2003, when it was established, and the end of March 2005. The NRLS is the first comprehensive national reporting system for patient safety incidents in the world, and is the only reporting system to cover all health care settings.

It is clear from the report that problems with medication cause a significant number of patient safety incidents: such problems accounted for 6,765 of the incidents reported (8 per cent of the total), including over 20 per cent of those reported in general practice and almost 9 per cent in acute hospital settings.

Such a high number of incidents involving problems with medicines suggests that pharmacists have an important role to play in minimising the risks to patients of incidents involving their medication, says Wendy Harris, senior pharmacist, safe medication practice, at the NPSA.

The role starts with the reporting of incidents, but the extent to which pharmacists are already reporting incidents is difficult to assess because reports are made anonymously.

"The incident reporting form does have a section on background and location into which someone reporting an incident could put information, such as that they are a pharmacist, but the data have not been looked at yet," Ms Harris explains. She adds: "Many pharmacists work in hospitals and mental health trusts linked directly to the NPSA, so reports from pharmacists will be coming to the NPSA through this route."



The Image Bank

Almost all the patient safety incidents reported to the NPSA come from local incident reporting systems but there is considerable variation in reporting rates across NHS organisations and the responsibility for investigating incidents lies with individual NHS providers, not the NPSA.

The NPSA emphasises that high incident reporting rates do not necessarily reflect unsafe practices and, in fact, organisations with an open culture of reporting, alongside local mechanisms for investigating incidents, may be those in which action is more likely to be taken to prevent further incidents.

Website reports

A small number of incidents are reported through the NPSA's website (<https://www.npsa.nhs.uk/eform>). The NPSA believes that reports received from staff direct via the form on its website will prove to be a rich source of information for learning about patient safety incidents since, for 94 per cent of the reports made through this route, the

incidents' reporters agreed to their information being shared with the trust involved. Also, in March 2005, the NPSA began a campaign to raise awareness of the reporting website and since then the number of people using it has increased. In fact, incident reporting levels as a whole have increased rapidly since the NRLS's inception — 20,594 of the reports analysed in the report (24 per cent) were received in March 2005 and almost 75,000 were received in April, May and June 2005.

The NPSA also found that 13 per cent of the reports coming in via the website were from medical staff, who, the NPSA believes, may be less likely than other members of staff to report incidents locally.

The NPSA is also planning to extend the functionality of the NRLS by developing a version for patients and the public to use. The Patient and Public Reporting project involves a web-based form specially designed to enable patients to report incidents direct into the NHS. This is being piloted during summer 2005 and will be launched in February 2006.

Community pharmacy

Of the 85,342 incident reports sent to the NPSA, only 54 came from community pharmacists. Ms Harris believes this is likely to be because the data pre-date the new community pharmacy contract, which requires contractors to keep incident logs and to report severe incidents to the NRLS, and she expects the number of reports from community pharmacists to increase in the future.

"At the moment, community pharmacy is not well integrated into the NHS primary care network and few community pharmacies are connected to NHSnet, but community pharmacists can report through the web and can also report through their primary care organisation, if they have a system set up," she says.

The NPSA will shortly be providing a paper-based template so that pharmacies without internet access can send reports to their pharmacy superintendents, or primary care organisations, who will then be responsible for forwarding the incident reports electronically to the NPSA.

In addition, a pull-out poster explaining how pharmacists can report incidents to the NPSA will go in the next issue of the Pharmaceutical Services Negotiating Committee's *Community Pharmacy News* and is available from the NPSA website.

The NPSA has also been in contact with a number of the large multiples, many of which already have either an electronic or a paper-based incident reporting system in

Patient safety in Scotland

The National Patient Safety Agency only deals with patient safety incidents in England and Wales. Development of a national approach to patient safety for NHS Scotland is led by NHS Quality Improvement Scotland. "Scotland already has an established system of national clinical standards against which the performance of each local NHS board is measured," Patrick Maitland-Cullen, senior communications and information officer for NHS QIS, explains.

"Since 2001 NHSScotland has also had to meet NHS QIS standards which set out the overall structures needed to deliver safe and effective patient care," he adds. "Key research on the approach to patient safety in Scotland is contained in the NHS QIS Incident and Near-Miss Reporting Study, due for completion in September. The study will show what safeguards on patient safety are in place across Scotland and how these work, and its recommendations will be put out to consultation.

The work includes a review of existing work under way in the NPSA and of other national reporting systems, such as Scottish Audit of Surgical Mortality and Serious Hazards of Transfusion," Mr Maitland-Cullen says.

place nationally, to see whether these systems can connect directly to the NRLS.

General practice

In general practice, the setting with the largest proportion of patient safety incidents involving medication, the NPSA has undertaken several initiatives to try to reduce the risk of medication resulting in a patient incident.

It is working with general practice IT prescribing software suppliers to redesign their systems to reduce the risk of errors arising from GPs picking from a list of drugs and selecting the wrong one, and also to limit the overload of severe alerts in such software, following findings about what the most important safety features of GPs' computer systems are.

The NPSA is also working to reduce the risk of incidents occurring as a result of patient misidentification (see **News** p129), look-alike medicines and anticoagulation treatment. For instance, it is working with the MHRA to influence the pharmaceutical industry to make changes to labelling and packaging to help distinguish between medicines, and different strengths of the same medicine.

The NRLS received 311 reports of incidents involving anticoagulants, including two deaths. The NPSA found that high risks were associated with patients being prescribed the wrong dose or no dose of anticoagulant, as well as inadequate safety checks at repeat prescribing and repeat dispensing in the community. It has investigated these issues and will be publishing a substantial report on its findings regarding the risks of anticoagulant treatment in the next few weeks.

Acute hospitals

The majority of incident reports received by NRLS to date are from acute hospitals and these incidents are representative of the in-hospital population in terms of both age and treatment.

As the NPSA is keen to stress, organisations with open reporting cultures may be those in which action is more likely to be taken to prevent further incidents. This may be the case in many hospitals, which often have strong patient safety programmes and undertake many initiatives to reduce the risk of patient incidents occurring, such as establishing multidisciplinary trust medication safety committees.

Narinder Bhalla, lead pharmacist, clinical governance, at Addenbrooke's Hospital, set up a multidisciplinary trust medication safety committee, with high level input from senior nurses, doctors and pharmacists, at Cambridge University Hospitals NHS Foundation Trust, when he began working there two and a half years ago.

"The committee takes an overview of NPSA guidance," Mr Bhalla says. "It looks proactively at drug incidents that have occurred in the trust and also receives individual reports from different departments." One of the committee's main activities is produc-

ing a medication safety action plan, including a list of the "top 12" areas to tackle, which the committee then works its way through.

The trust also has its own risk management database, which includes a grading matrix based on one from the NPSA, Mr Bhalla adds. "For each incident, the database assesses how likely it is to happen again. The trust has had 1,600 incidents between April 2004 and March 2005 and we use the database to look at which of them we need to look at in more detail."

The committee has also reviewed the trust's medication policies and procedures. "We realised that some procedures described were not clear and so we undertook an overview of the whole procedure from prescribing to administration," Mr Bhalla says. "But we've found that it is not enough simply to review procedures and issue guidance — the core messages have to be included in training. So we built the lessons we had learnt from the review into the core medication safety training for nurses and that now includes a one-and-a-half-hour session from pharmacists," he adds.

The most common incident at Addenbrooke's is drugs not being given — "omission" drug incidents. The committee found that there is often a legitimate reason for the omission, but that this has been left unrecorded, so the members of the committee met with the senior clinical nurses at the hospital and emphasised the need for this to be highlighted as part of nurses' mandatory training.

The induction training for doctors was also reviewed and it has since been extended from a 5–10 minute chat to a 15–20 minute session with a pharmacist as well as an OSCE (objective structured clinical examination) workshop, which discusses common problems arising from prescriptions. "That started in February and, although we have not yet done a full audit, pharmacists have said they have already noticed far fewer basic mistakes

on prescriptions, such as doses being crossed out and written over, rather than rewritten," Mr Bhalla says.

Future work

The NPSA report takes a top level view of patient safety issues, Ms Harris says, but the NPSA is also looking at a number of the issues discussed in the report in greater detail. "For instance," she explains, "we are starting to look at the use of injectables, assessing at which stage problems are occurring — whether it is with the product, route or dose chosen."

The report found that practical aspects of drug preparation and administration are not formally taught — clinical staff learn how to prepare and administer medicines from one other on the wards. Also, injectable medicines are often prepared in the middle of busy wards, with nurses being distracted during the process.

The NPSA is also planning work with the NHS Medicines Manufacturing and Preparation Modernisation Board and other stakeholders to "develop a multidisciplinary standard of practice that will define and clarify safe practice for preparing and administering injected medicines in near-patient areas".

The report adds: "Poorly designed medicine products for injection are being supplied in clinical areas with little consideration of the practical difficulties of using them. Medicines with confusing information about preparation and administration, and requiring complex calculation, preparation and administration methods, are supplied with limited help and assistance for ward staff."

The NPSA says it intends to encourage greater involvement from pharmacists to further support, provide training in and audit the preparation and administration of injectable medicines in near-patient areas. Ms Harris adds that it is working on this issue with a number of pharmacists and hopes to publish a report of its findings at the end of the year.

Forthcoming initiatives

A number of resources and programmes designed to improve patient safety are being launched by the NPSA in the coming months:

- The NPSA has launched the pilot phase of its extranet website, which will feed back patient safety data direct to NHS organisations. This initial pilot, which involves eight NHS trusts, will generate comments and suggestions about what should be included in the next phase, which will be available to all health care organisations reporting to the NHS.
- From August, health care staff will be able to access all the latest information on patient safety via a website (www.saferhealthcare.org.uk). The website will provide NHS staff with access to NPSA solutions, online learning, collaborative functions, interactive tools and best practice advice.
- The Manchester Patient Safety Framework helps NHS staff self-reflect on their progress in developing a positive patient safety culture. The NPSA has been collaborating with the University of Manchester to tailor this framework to acute, mental health and ambulance settings. It will be available to NHS staff from August.
- A safer practice notice is due to be issued across the NHS. "Being open" also involves a policy, an e-learning toolkit and a one-day video and role play-based training programme for clinicians. The NPSA plans to launch the policy and safer practice notice this year; the training tools will be available from the autumn.
- The NPSA will also be launching a public engagement campaign, to raise awareness and empower patients by providing them with the information they need to take an active role in their own care.