A qualitative evaluation to determine which factors that influence medication incident reporting and categorisation

Yogini Jani1,2,3 Rosemary Schuster1 and David Gerrett4
1UCLH NHS Foundation Trust, 2UCL School of Pharmacy, 3NHS Specialist Pharmacy Service, 4NHS Improvement

A semi-structured interview approach was employed

Participants at a teaching hospital were opportunistically sampled and asked by a pharmacy student to categorise fifteen scenarios, each corresponding to a NRLS medication category, initially using their own words, and then against the NRLS categories (figure 1).

Responses were captured verbatim, including any additional thoughts, explanations and reasoning shared by the participants.

Thematic analysis was conducted to identify trends and patterns for factors that influenced choice of category. Verbal consent was obtained from participants.

Results

Seventeen healthcare professionals varying background, experience and incident reporting history participated as shown in figure 2. Six key themes were noted as listed in figure 3.

Introduction

Regular, high volume reporting of medication incidents has been promoted as a way of learning to improve safety. High-level trends and themes derived from incident categories may influence policy decisions, however variation in incident report quality and categorisation has been noted. Since 2014, Medication Safety Officers (MSOs), who are predominantly pharmacists, are expected to help reduce medication errors through improved reporting and shared learning.

The aim of was to determine factors that influence reporting and categorisation of medication incidents by exploring how health care professionals categorise spontaneously, and comparing this to the National Reporting and Learning System (NRLS) categories.

Method

A semi-structured interview approach was employed

Participants at a teaching hospital were opportunistically sampled and asked by a pharmacy student to categorise fifteen scenarios, each corresponding to a NRLS medication category, initially using their own words, and then against the NRLS categories (figure 1).

Responses were captured verbatim, including any additional thoughts, explanations and reasoning shared by the participants.

Thematic analysis was conducted to identify trends and patterns for factors that influenced choice of category. Verbal consent was obtained from participants.

Conclusion

The national focus on improving the reporting and learning, and the focus on MSOs to improve the quality make this an important area to understand. This small scale study at a single teaching hospital showed that many factors influenced the categorisation and also highlighted that the NRLS categories may require review and possible revision to match the nature of the incidents that are being reported. MSOs can use the findings to develop local strategies e.g. training to improve the quality and consistency of reports.

References


Figure 2: Profession of participants and numbers of years qualified

<table>
<thead>
<tr>
<th>Profession</th>
<th>less than 1 year</th>
<th>1-3 years</th>
<th>3-5 years</th>
<th>more than 5</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Nurse</td>
<td>1</td>
<td>1</td>
<td>2</td>
<td>2</td>
<td>6</td>
</tr>
<tr>
<td>Pharmacist</td>
<td>1</td>
<td>3</td>
<td>4</td>
<td></td>
<td>8</td>
</tr>
<tr>
<td>Pre-reg pharmacist</td>
<td>2</td>
<td></td>
<td></td>
<td></td>
<td>2</td>
</tr>
<tr>
<td>Senior nurse</td>
<td>2</td>
<td></td>
<td></td>
<td></td>
<td>2</td>
</tr>
<tr>
<td>Medical doctor</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
<td>1</td>
</tr>
<tr>
<td>Pharmacy technician</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
<td>1</td>
</tr>
<tr>
<td>Student nurse</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
<td>1</td>
</tr>
<tr>
<td>Total</td>
<td>4</td>
<td>1</td>
<td>3</td>
<td>9</td>
<td>17</td>
</tr>
</tbody>
</table>

Figure 3: Key themes

- Incident details
  - participants categorised detailed reports with greater certainty and more quickly
- Personal knowledge
  - influenced the certainty and speed of categorisation
- Participants’ confidence and belief in their responses
  - directly affected their decision to revise their choice(s)
- A learning effect was noted
  - participants began using NRLS categories
- No spontaneous or natural association with some NRLS categories
  - for example “wrong quantity”
- Participants were less inclined to revise their choice
  - even if they could see a “fit”