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Summary
This is the fourth article in a nine-part series describing the Principles of Nursing Practice developed by the Royal College of Nursing (RCN) in collaboration with patient and service organisations, the Department of Health, the Nursing and Midwifery Council, nurses and other healthcare professionals. This article discusses Principle C, the provision of safe and effective care.

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THE THIRD Principle of Nursing Practice, Principle C, reads:
‘Nurses and nursing staff manage risk, are vigilant about risk, and help to keep everyone safe in the places they receive health care’.

This Principle is underpinned by three inter-related factors: a requirement to deliver an NHS centred on patients’ experiences, deliver safe and effective care, and consider the context in which care is delivered. This last point is closely related to current drivers informing the innovation, productivity and prevention agenda (Department of Health 2008, 2010).

A range of stakeholders was consulted in the development of the Principles of Nursing Practice and given information on a variety of clustered themes that could potentially constitute each individual Principle. Over 90% of respondents identified patient safety as a key area that required a dedicated Principle. Principle C emphasises the need for vigilance in terms of recognising risk, having the necessary skills and competences to be able to assess risk and ensuring effective systems are in place to manage risk (Royal College of Nursing 2010). It requires all nursing staff to accept responsibility and accountability for their decisions and actions in relation to the way care is planned, implemented and evaluated, regardless of the setting in which care is delivered. Principle C is closely linked to Principle B (Scrivener et al 2011).

Some of the contextual factors important in delivering safe and effective care include: organisation and workplace culture; staffing levels and skill mix; patient acuity and turnover; effectiveness of the clinical leadership; provision of ongoing professional development; commitment to health and safety; and the skills, competences, attitudes and behaviours of each member of staff. Many of these factors can be classified in a human factors framework (Box 1).

Risk management and patient safety
Risk management has been defined as ‘a process to raise the quality and safety of services… it is a particular approach to improving the quality of care, which places special emphasis on occasions in which patients are harmed or disturbed by their treatment’ (Currie et al 2003). Managing risk and improving the safety of care is the collective responsibility of healthcare organisations and the individual responsibility of those working in them.

Front line staff have been identified as a ‘last defence’ against patient safety failure (Reason 2004). In his ‘three bucket’ model, Reason (2004) suggested that there is a requirement for ‘error wisdom’ through equipping clinical staff with the mental skills to help them recognise and perhaps avoid situations in which errors may happen. The potential for a clinical situation to become risky is
influenced by self, context and task. The level of ‘bad stuff’ present in each of the buckets dictates whether or not a situation is becoming unsafe. The ‘self’ bucket includes factors related to knowledge, skills, capacity and emotions of individual team members. The ‘context’ bucket includes the availability of serviceable equipment, the working environment, level of team support and organisation and management issues such as culture, targets and workload. The ‘task’ bucket includes issues around the task’s complexity, whether the individual is familiar with the task in hand and whether one task gets completed before another task is started.

The three bucket model is a useful strategy for supporting front line staff to identify potentially unsafe situations and to take action before patients are harmed. By remaining aware of the levels of ‘bad stuff’ in each of the buckets, members of the nursing team can become more attuned to the potential for something to go wrong, therefore making them more risk aware and more able to act.

**Role of nursing in patient safety** Nurses are often identified as the professional group best placed to ensure the safety of patients, perhaps because nurses are perceived as primary caregivers and advocates for patient safety in different clinical areas (Rogers et al 2007, Leach et al 2010, Lyndon 2010). Such areas include the prevention of falls and pressure ulcers, delivery of safe nutritional care and reduction of infections—all factors relevant to the entire spectrum of care. Failures in the provision of safe and effective care in these areas can lead to patients experiencing avoidable harm, delays in recovery and discharge, and increased NHS costs.

**Resources to help nurses deliver safe, effective care** Recent national initiatives have focused on patient safety throughout the UK. While there is support for these initiatives within nursing, the pace of change can lead to front line staff feeling overwhelmed. A number of organisations have developed resources and tools including a range of nursing outcome measures (Tables 1 and 2), to assist staff in delivering safe and effective care.

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### BOX 1

**Human factors framework**

The study of human factors is defined as ‘the scientific discipline concerned with the understanding of interactions among others and other elements of a system and the professions that apply theory, principles, data and methods to design in order to optimise human well-being and overall system performance’.

Human factors in healthcare include:

- People (patients, public, professionals).
- Equipment, medicines, information.
- Tasks (jobs, roles, responsibilities).
- Workspace (layout, storage).
- Environment (lighting, noise, temperature).
- Organisation (culture, training provision, leadership, procurement).

(Norris 2009)

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### TABLE 1

**Resources to help nurses deliver safe, effective care**

<table>
<thead>
<tr>
<th>Falls prevention</th>
<th>Nutrition and hydration</th>
<th>Pressure ulcer prevention</th>
<th>Reducing infection</th>
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</thead>
</table>

(All websites last accessed: March 11 2011)
usual care, this intervention reduced the number (Lupari 2011). When evaluated against routine or the chronic illness case management service team intervention, with almost 700 being managed by specially trained nurses who showed patients how to maintain effective inhaler technique. This risk was managed by older people at home to manage their multiple chronic conditions. One of the risk factors identified in COPD patients included poor inhaler technique, which can lead to a deterioration in patients’ health. This risk was managed by specially trained nurses who showed patients how to maintain effective inhaler technique.

More than 1,500 patients have received the intervention, with almost 700 being managed by the chronic illness case management service team (Lupari 2011). When evaluated against routine or usual care, this intervention reduced the number of unplanned admissions and the length of hospital stay. Patients receiving the intervention also reported significant improvements in health status, functionality and quality of life. This case study illustrates the requirement to be vigilant about risk, as articulated in Principle C. Nurses used their skills to identify potential deterioration in patients and acted to prevent further deterioration. This nurse-led practice improvement has had a positive effect on the safety of patients receiving care and treatment through the chronic illness case management service.

**Case study**

An investigation into the provision of care for patients in Northern Ireland with chronic conditions such as chronic obstructive pulmonary disease (COPD), asthma, heart failure and diabetes, tested an intervention aimed at proactively managing individual patient risk factors, reducing numbers of unplanned hospital admissions and length of hospital stay (Lupari 2011). The nursing team worked with high-risk older people at home to manage their multiple chronic conditions. One of the risk factors identified in COPD patients included poor inhaler technique, which can lead to a deterioration in patients’ health. This risk was managed by specially trained nurses who showed patients how to maintain effective inhaler technique.

<table>
<thead>
<tr>
<th>Falls prevention*</th>
<th>Nutrition and hydration**</th>
<th>Pressure ulcer prevention†</th>
<th>Reducing infection‡</th>
</tr>
</thead>
<tbody>
<tr>
<td>Percentage of patients with appropriate observations documented after a fall. Percentage of appropriate staff receiving training in falls management within the previous 12 months. Number of patients who have been harmed by falls. Percentage of patients who have received the four basics of falls prevention (has the person fallen recently, avoid unnecessary hypnotic and sedative medications, ensure appropriate footwear, and ensure call bells are within reach).</td>
<td>Number of staff undertaking training in nutrition and hydration care within the previous 12 months. Percentage of patients screened using formal tools to identify the risk of malnutrition. Number of patients with an appropriate action plan. Percentage of patients receiving information on a healthy, balanced diet.</td>
<td>Number of staff undertaking staff training in pressure ulcer prevention within the previous 12 months. Number of root cause analyses that have been undertaken. Number of local champions. Number of patients with an appropriate action plan. Number of pressure ulcer-free days.</td>
<td>Number of staff who have access to hand decontaminants at the point of care. Number of staff undertaking mandatory training on infection prevention and control. Number of staff who have access to annual and ongoing infection control updates through protected study time.</td>
</tr>
</tbody>
</table>

**References**


**Conclusion**

Patient safety remains a key factor in reforming the NHS. Nurses have a major role in investigating and implementing improvements in patient safety. This article has highlighted the importance of Principle C and the associated nursing responsibilities and accountabilities for patient safety NS.

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**TABLE 2 Examples of nursing outcome measures**

- Percentage of patients who have been harmed by falls.
- Number of patients who have received the four basics of falls prevention (has the person fallen recently, avoid unnecessary hypnotic and sedative medications, ensure appropriate footwear, and ensure call bells are within reach).
- Number of staff undertaking training in nutrition and hydration care within the previous 12 months.
- Percentage of patients screened using formal tools to identify the risk of malnutrition.
- Number of patients with an appropriate action plan.
- Percentage of patients receiving information on a healthy, balanced diet.
- Number of staff undertaking staff training in pressure ulcer prevention within the previous 12 months.
- Number of root cause analyses that have been undertaken.
- Number of local champions.
- Number of patients with an appropriate action plan.
- Number of pressure ulcer-free days.
- Number of staff who have access to hand decontaminants at the point of care.
- Number of staff undertaking mandatory training on infection prevention and control.
- Number of staff who have access to annual and ongoing infection control updates through protected study time.