Transition Care for People with Catheters in Hospital and their Homes

Final Report
Dec 2005

Submitted on behalf of the Project Team by Professor Colin Torrance
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Project Team

Professor Colin Torrance ................................................. Victoria University
A/Prof David Fonda ...................................................... Caulfield General Medical Centre
Ms Rachel Barton .................................................. Caulfield General Medical Centre
Ms Janie Thompson ................................................ Caulfield General Medical Centre
Ms Gail Miles .......................................................... Royal District Nursing Service
Mr Philip De Rose .................................................. Royal District Nursing Service
Mr Luke Derriman .................................................. Alfred Hospital
Dr Allison Brookes ................................................ University of Melbourne
Mr Gregory Powell

Abbreviations

CCS – Caulfield Continence Service
CGMC – Caulfield General Medical Centre
CNA – Continence Nurse Advisor
RDNS – Royal District Nursing Service
UM – University of Melbourne
VUT – Victoria University of Technology
Introduction

The discharge of a patient from acute or sub-acute care with a urinary catheter in situ challenges nursing and medical practitioners and institutions involved in the patient’s care. No less important is the stress and anxiety which may be felt by the patient and his/her informal caregivers. Research suggests that the risks associated with urinary catheter use may be ameliorated by the implementation of a comprehensive patient/carer education program and clear communication pathways between those involved in the provision of care. Literature and local anecdotal evidence have suggested the need for an education program and communication tools that can be incorporated into the discharge planning and transition of patients between acute and sub-acute care to domiciliary nursing. These guidelines are part of such a package of education program and communication tools currently being piloted by The Alfred, Caulfield General Medical Centre and Royal District Nursing Service.

Background

As the importance of patient education – particularly as part of coordinated discharge processes – continues to be recognised within acute and sub-acute services, health practitioners are confronted with the demand to develop accessible information packages in a variety of clinical areas. Those patients with care needs not confined to specialties or wards offer a particular challenge to institutions seeking to ensure optimal inpatient and domiciliary care. One such patient cohort includes those discharged with a urinary catheter; in any hospital catheterised patients may have a wide variety of diagnoses and morbidities (Roe, 1990).

Patients facing continence challenges while an inpatient for medical or surgical conditions are regularly discharged with a urinary catheter. Patients’ and carers’ need for information regarding catheter care are often underestimated and may be ad hoc as the focus remains on the condition prompting initial admission. Emphasising the risk that catheter care may not remain a focus of the inpatient stay was overseas research which found physicians were often unaware that patients were catheterised; this was particularly so if the catheter was no longer needed or inappropriately used (Saint, et al, 2000, Saint, 2002).

Lack of knowledge about appropriate catheter care leaves patients at risk of developing a variety of complications that may seriously compromise their well-being. Effective responses to patients’ and carers’ needs post discharge is further hampered by lack of information and communication relayed between hospital and domiciliary care.

While local figures are not readily available, overseas estimates of the numbers of hospital inpatients with a urinary catheter are between 10 and 12 percent (Getliffe, 1995; Pellowe, 2001). A significant number of these will rely upon a urinary catheter upon discharge and, without adequate education and support from domiciliary nursing are at risk of short- and long-term complications. Overseas figures suggest that around 4 percent of patients are discharged with a Foley (urethral) catheter (Evans, 1999).

Risks associated with urinary catheter use

Risks associated with urinary catheters are numerous and research suggests the need for use only when other management of urinary discharge is impossible, and that use should
be for as short a time as possible. While playing an important role in the care of many patients, the use of urinary catheters is also associated with increased morbidity and mortality (Robinson, 2004). Decisions about catheterisation should include patients and carers and have clear timelines for review of the need for the catheter as patient requirements and conditions change (Pomfret, 2000). Risks associated with long-term catheter use include kidney stones, epididymitis and scrotal abscess, erosion of the urethra and urethral fistula (Newman, 1998). All patients with a urinary catheter – either short- or long-term are at risk of the following:

**Urinary Tract Infection:**

Again, while local figures are not available, overseas research suggests that the use of Foley indwelling catheters is associated with approximately 80 percent of nosocomial urinary tract infections. Risk is exacerbated for older patients, those requiring extensive bed rest, and patients suffering from malnutrition. As well, patients with chronic conditions, who have undergone urinary tract instrumentation are at greater risk, as are female patients (McKinney, 1995).

**Bacteriuria:**

Bacteria may enter the bladder via the urethra meatus, the point where the catheter joins the collection bag and the collection bag's drainage point (Newman, 1998). Reducing the number of disconnections of the catheter and bag may go some way to reducing the risk of bacteria entering the bladder (Newman, 1998). Bacteriuria can lead to urosepsis and septicaemia (Newman, 1998). Older patients are at increased risk from bacteriuria – up to 20 percent from a single catheterisation (Cravens and Zweig, 2000).

**Urosepsis:**

Occurs up to three times more often in catheterised patients; previous practice in irrigating the catheter to wash out bacteria has shown to be ineffective, and may allow more organisms to enter (Newman, 1998).

**Urethritis:**

Urethritis may be more prevalent in patients with frequent insertion of catheters, resulting in irritation of the urethra (Newman, 1998).

**Problems associated with catheter use**

A number of problems are associated with catheter use that, while not necessarily increasing risk, are bothersome for patients and carers. These include:

**Dislodgement of catheter:**

Patients may purposefully dislodge catheters (through confusion, discomfort, or decision to discontinue use) or they may become dislodged by incorrect anchoring leading to pressure and weight inadvertently being placed on the catheter (Newman, 1998). Bladder spasms may also expel the catheter (Newman, 1998).

**Urine leakage:**

Urine leakage occurs in 65 percent of patients, caused by bladder spasm, infection and too large catheter (Newman, 1998). Restrictions on the catheter caused by tight clothing,
position of patient, the drainage bag being full, kinks in the drainage system and allergic reaction to the catheter materials may also result in urine bypassing the catheter and causing leakage (Robinson, 2004).

**Effectiveness of patient education**

A review of research of long-term urinary catheter care found that patients had serious deficits in patient understanding of their catheter. Deficits included lack of understanding of how the catheter functioned and where it was positioned in the body, and lack of knowledge of how to care for the catheter and maintain hygiene (Wilde, 1997). In addition, catheter use interfered with patients social and family relationships due in part to lack of knowledge and education (Wilde, 1997).

Benefits of patients being informed about their health care needs include physiological and psychological outcomes (Cortis and Lacey, 1996). Better adjustment to hospitalisation, increased ability to cope with procedures, quicker recovery from surgery and increased patient compliance with treatment prescriptions are all associated positively with informed patients (Cortis and Lacey, 1996).

For patient education and information sharing to be effective it needs to be presented in language which can be understood, provided in a personalised manner, and allow time for questions and clarification (Cortis and Lacey, 1996). More specifically, patients (and their carers) need information to be able to recognise a possible urinary tract infection, know how to reduce infection, and who to contact promptly if an infection is suspected (McKinney, 1995). While the catheterisation procedure itself may not be complicated, the management of the ‘physical, psychological, social and sexual effect on the patient and family’ requires that these aspects are acknowledged and included in education and information provided to patients and carers (Pomfret, 2000).

Patient and carer education must be targeted appropriately in recognition of patients’ ongoing needs and abilities. Effective education relies on patient/carer manual dexterity and motivation (Marinkovic and Badlani, 2001); both of these needing to be assessed as part of the discharge planning and education program. Further complicating education and information sharing may be the different practices of catheterisation suitable for hospital and home. Patients and carers must understand why these may be different to minimise confusion and aid consistent care during the transition from hospital to home (Rainville, 1994).

Research exploring the concerns of men post radical prostatectomy found that provision of information was critical to health rehabilitation and patient concerns included the need to know how to manage their catheter (Moore and Estey, 1999). In other research most patients being discharged after a prostate resection were found to be uncomfortable about the thought of being discharged with a urinary catheter. These concerns include the involvement of their partners in their catheter care (LeVasseur, Fitzgerald and Bell, 1998).

**Catheter Discharge Checklist and Catheter Discharge Checklist Guidelines**

The Catheter Discharge Checklist should be completed as part of the discharge process and should be read in conjunction with the Catheter Discharge Checklist Guidelines. These form an important part of the overall education and communication program, allowing staff within the hospital to alert each other and community practitioners of the need for follow up education. Research clearly states that provision of education should
begin before discharge (preferably before catheterization) and be continued in the community (Roe, 1989). The Catheter Discharge Checklist and the Catheter Discharge Checklist Guidelines include information to assist hospital and community staff to decide on appropriate catheterization practices from options supported by research and practice.

Catheter Care Booklet

Previous examples of catheter education programs based around a patient/carer booklet have been fruitful. While patients and carers have varying levels of interest and motivation, a booklet able to be kept by the patient can enable them to continue to learn over time and as they require information. Consistency between hospital and domiciliary care is enhanced by the use of such a booklet (Roe, 1990).

Australian research states that the provision of written information for later referral enhances self-management and that information relating to addressing potential problems that may arise with catheter use may facilitate patient independence (Fleming, Day and Glanfield, 2000). The need for consistent documentation was recognised as important for follow-up care (Fleming, Day and Glanfield, 2000).

The Catheter Care Education booklet is designed to provide patients with an appropriate resource, enabling them to reduce the risk of the above conditions and alleviate the problems associated with catheter use. Its use will provide clinicians both in the hospitals and the community with a useful starting point for discussion of catheter care with patients and/or carers, as well as enabling them to follow up and reinforce information as necessary.

Project Objectives

- Enhance patient (and carer) experiences and outcomes when discharged from hospital with a catheter in situ
- Identify clinical, educational and other unmet needs faced by patients (and carers) with catheters as they move from the hospital to the community setting
- Develop a best practice model for clinical care of patients (and carers) with catheters as they move between the hospital and community settings
- Instigate change management within hospital and community nursing settings to promote adherence to best practice model
- Evaluate the project with reference to its applicability for other areas of continence care
Practitioner Surveys:

The surveys were distributed throughout the three services involved with this project: The Alfred, Caulfield General Medical Centre (CGMC), and Royal District Nursing Service (RDNS). Participants from medicine, nursing and physiotherapy were invited to participate.

In total, sixty-three clinicians (4 doctors and 59 nurses) completed and returned the surveys. Informal discussion with physiotherapists suggested that their lack of involvement in discharge planning meant they had little to contribute; physiotherapy was more likely to be relevant to patients attending outpatient services at the Caulfield Continence Service (CCS), CGMC, outside the remit of this project.

Of the clinicians who responded 25 were employed in acute care, 25 in sub-acute care, and 9 by the district nursing service, 3 in rehabilitation care, and 1 by a specialist continence service.

The following analysis adopts the thematic approach used in the surveys; key issues raised are summarised for clarity. It should be noted that the project team developed the survey in response to recognition of key areas of ongoing concern voiced by clinicians and patients; as such to quite some extent the areas of concern were (broadly) pre-defined. Scope for participants to voice other concerns and identify further issues suggests that the coverage of the survey was appropriate.

The broad areas of concern explored in the survey were information provision to patients (and their carers) regarding:

- the need for a catheter;
- the alternatives to having a catheter;
- the review of the need for a catheter;
- hygiene needs specific to catheter use;
- changing, positioning and cleaning of catheter bag;
- problems and side effects associated with catheter use;
- reducing the risk of urinary tract infections;
- removal of catheter;
- catheter equipment;
- who to contact for further information as necessary; and
- continence and community nursing services available to patients.
The purpose of the survey was to identify clinician involvement in discharge planning of patients leaving hospital with urinary catheters including responsibility for patient education and information provision, and follow up protocols. This data was used to contribute to the diagrammatic model identifying needs and deficiencies in the existing process, which were under the remit of this project. In particular, the data was used to guide the development of the patient education and clinical guidelines being readied for piloting (see below).

The participants articulated the overall importance of patient understanding and information provision for all facets of the use of urinary catheters. Participants were asked to choose between the options of Very Important, Important, or Not Important. All responses described information regarding the need for a catheter, catheter hygiene needs, management of catheter bags, problems and side effects, reducing risk of urinary tract infections, who to contact for further information regarding management, information regarding continence services, and information regarding community nursing services as Very Important or Important. A small number described information regarding alternatives to having a catheter (1), Review of need for catheter (1) and type of catheter used (4) as Not Important. (See Table 1)

<table>
<thead>
<tr>
<th>Item</th>
<th>Very Important</th>
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<th>Important</th>
<th>%</th>
<th>Not Important</th>
<th>%</th>
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<td></td>
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<td>71</td>
<td>18</td>
<td>29</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

* 1 no response

Participants identified important deficits in the process of information provision: in all categories of how regularly information was given (possible responses Always, Usually, Rarely, or Never) the majority (over half for all categories except for alternatives to having a catheter, review of catheter need, and type of catheter used) chose Usually. While acknowledging that 100% of patients receiving information may be unrealistic, the high number of participants selecting Rarely in all categories suggests the opportunity to improve the area of information provision across all categories. (See Table 2)
Similarly, participants recorded dissatisfaction with what information was provided to patients/carers. A lack of appropriate education/information materials exacerbated this. Participants were given the option to choose between Totally Satisfied, Somewhat Satisfied, Somewhat Unsatisfied and Totally Unsatisfied with regard to the information given to patients/clients in each of the categories. The only category, which had a slight preference for Totally Satisfied/Somewhat Satisfied, was the information currently given about catheter hygiene needs. All other categories had a preference towards Somewhat Satisfied/Somewhat Unsatisfied, although this was often slight. (See Table 3)

### Table 2 – How regularly is information provided to patients/carers

<table>
<thead>
<tr>
<th>Item</th>
<th>Always</th>
<th>(%)</th>
<th>Usually</th>
<th>(%)</th>
<th>Rarely</th>
<th>(%)</th>
<th>Never</th>
<th>(%)</th>
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<tr>
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<td>50</td>
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<td>3</td>
<td>5</td>
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<tr>
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<td>34</td>
<td>55</td>
<td>3</td>
<td>5</td>
<td></td>
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<td>Management of catheter bags *</td>
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<td>39</td>
<td>63</td>
<td>7</td>
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<td></td>
<td></td>
</tr>
<tr>
<td>Problems or side-effects *</td>
<td>14</td>
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<td>35</td>
<td>56</td>
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<tr>
<td>Community nursing services +</td>
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* 1 no response  
# 2 no response  
+ 3 no response

### Table 3 – Satisfaction with information currently given to patients/clients

<table>
<thead>
<tr>
<th>Item</th>
<th>Totally Satisfied</th>
<th>(%)</th>
<th>Somewhat Satisfied</th>
<th>(%)</th>
<th>Somewhat Unsatisfied</th>
<th>(%)</th>
<th>Totally unsatisfied</th>
<th>(%)</th>
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<td>The need for a catheter #</td>
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<td>Problems or side-effects #</td>
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<tr>
<td>Reducing risk of urinary tract infection *</td>
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<td>2</td>
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</tbody>
</table>

* 1 no response  
# 2 no response  
+ 3 no response  
ø 4 no response
When asked for suggestions for improving the provision of information the need for clarity regarding responsibility for information and education provision was evident, as was a clear protocol for communication between care team members.

I think the RMO should explain why “need for catheter” and then nurse/doctor inserting/applying should also briefly explain.

The issue should form part of discharge planning and be discussed in team meetings.

Need simple protocol so all team members know whose responsibility it is and whether it has been done.

The need for printed material that the patient or carer could retain for later reference as necessary was identified, although one participant believed that people did not have time to read these.

Information for practitioner to use when explaining need for and care for a catheter. Patient can then take this information home to refer to as necessary. This also helps the nurse practitioner to not forget any information. If pack is given to patient it is assumed all material within has been explained.

Structured educational test – where appropriate aspects can be covered and ticked off over a set time frame during client episode.

Booklet that patient can keep and staff to go through with patient.

Education sessions on ward level especially in the absence of Continence Nurse.

Recognition of the significance of a catheter to patients and the need for consistent, timely information was apparent in the participants’ comments.

Person giving the information should be allowed maximum time with client as the need for a catheter is a huge issue in client’s life, especially initially.

Involves family, ensure information is consistent between patient and nursing staff, i.e. No mixed messages.

Discussion by care providers with patient and family regarding the need, be it long/short term. Negative side effects and positive outcomes. Explanation that this may not be only option. Follow up discussion with someone the patient and family can relate to [to] sort out any problems or further issues.

Barriers to the achievement of these goals included lack of time, lack of staff, lack of team protocols, lack of training for staff, and lack of suitable information material.

It would be good if doctors can be given basic information on care and use of catheter bags.

RN education needed!! Should be regular education with documentation regarding patient needs/education/catheter position etc.

Information sheets for doctors to give to patients would be useful both for education the doctors and the patients.
[Need] to have full time continence nurse in the hospital that can provide continence care and continuous service… in general to support medical staff and nursing staff…

Increased access to specialist services (eg continence nurse advisor) in hospital setting. Promotion of existing services (eg. RDNS, Continence advisory service for in-home visits, outpatients clinic at Caulfield).

Usual problem is time allocation

A copy of the practitioner survey is attached (Appendix 1).

No participants expressed a willingness to participate in a focus group interview to elaborate on the issues raised in the survey. While richer, qualitative data would have been obtained if the focus group interviews had been possible, the clinicians representative of the three services who are members of the project team suggest that a good overview of needs and shortcomings has been achieved. The survey did elicit a surprisingly large number and breadth of additional responses when participants were asked for suggestions, which would otherwise have been sought through focus groups.

In summary, key issues important for this project which have been raised by participants in the practitioner survey include:

- the need for clear protocols to guide education and information provision;
- the need for a cohesive team-based education and information program which incorporates acute, specialist and district nursing services;
- the need for accessible education for practitioners; and
- the need for suitable, printed patient/carer information, which can be retained for later reference.
**Patient/Carer surveys:**

Patient/carer surveys followed the same broad framework of issues as the practitioner surveys with the inclusion of questions regarding fluid intake and who to contact if the catheter becomes blocked or there is an emergency. They were distributed to patients and/or carers upon discharge from acute care. Five surveys were returned from patients. Even though the numbers are smaller than hoped for, the clinical members of the project team are confident that they are representative of ‘typical’ patients.

Patients reported a range of levels of satisfaction with the information they received. Given the opportunity to respond as Totally Satisfied, Somewhat Satisfied, Somewhat Unsatisfied and Totally Unsatisfied, on all but 5 of the categories patients responded across the spectrum. (See Table 4)

<table>
<thead>
<tr>
<th>Item</th>
<th>Totally Satisfied</th>
<th>%</th>
<th>Somewhat Satisfied</th>
<th>%</th>
<th>Somewhat Unsatisfied</th>
<th>%</th>
<th>Totally unsatisfied</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>The need for a catheter</td>
<td>3</td>
<td>60</td>
<td>2</td>
<td>40</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Alternatives to having a catheter *</td>
<td>2</td>
<td>50</td>
<td></td>
<td></td>
<td>1</td>
<td>25</td>
<td>1</td>
<td>25</td>
</tr>
<tr>
<td>Review of need for catheter #</td>
<td>2</td>
<td>67</td>
<td>1</td>
<td>33</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Catheter hygiene needs</td>
<td>3</td>
<td>60</td>
<td>1</td>
<td>20</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Management of catheter bags *</td>
<td>2</td>
<td>50</td>
<td>1</td>
<td>25</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Problems or side-effects</td>
<td>2</td>
<td>40</td>
<td>1</td>
<td>20</td>
<td>1</td>
<td>20</td>
<td>1</td>
<td>20</td>
</tr>
<tr>
<td>Reducing risks of urinary tract infection</td>
<td>3</td>
<td>60</td>
<td>1</td>
<td>20</td>
<td>1</td>
<td>20</td>
<td>1</td>
<td>20</td>
</tr>
<tr>
<td>Catheter management-who to contact #</td>
<td>2</td>
<td>67</td>
<td></td>
<td></td>
<td></td>
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<td></td>
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<tr>
<td>Catheter removal</td>
<td>3</td>
<td>60</td>
<td>2</td>
<td>40</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Type of catheter used</td>
<td>3</td>
<td>60</td>
<td></td>
<td>1</td>
<td>20</td>
<td>1</td>
<td>1</td>
<td>20</td>
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<tr>
<td>Continence services</td>
<td>3</td>
<td>60</td>
<td></td>
<td>1</td>
<td>20</td>
<td>1</td>
<td>1</td>
<td>20</td>
</tr>
<tr>
<td>Community nursing services</td>
<td>3</td>
<td>60</td>
<td>1</td>
<td>20</td>
<td></td>
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<td></td>
</tr>
<tr>
<td>Fluid intake</td>
<td>5</td>
<td>100</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Blockage of catheter – who to contact</td>
<td>2</td>
<td>40</td>
<td>1</td>
<td>20</td>
<td>1</td>
<td>20</td>
<td>1</td>
<td>20</td>
</tr>
<tr>
<td>Emergency – who to contact *</td>
<td>2</td>
<td>50</td>
<td>1</td>
<td>25</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

* 1 no response  
# 2 no response

There were few additional comments offered on the surveys; those that were given strongly echoed the need for timely and accessible information. The lack of communication pictured in the surveys underscores the need for a system, which does not allow patients to pass through without having at least minimal information to ensure their wellbeing. Examples from the comments include:

*Was not given any information about alternative.*

*Nobody discussed it with me, I should be informed.*

*Urinary tract infection should have been explained to me.*
A copy of the patient/carer survey is attached (Appendix 2).

While greater input from patients/carers at this stage may have been illuminating, the data is consistent with the recognition of need for this project recognised by the project team, clinician experiences of the issues and the survey data from the practitioner survey. As with the practitioner survey, no patients/carers expressed a willingness to participate in an interview at this stage.
Clear from the surveys and informal discussion with clinicians is the continual fractures in the information/education process for people who are discharged from acute and sub-acute care with a urinary catheter. While the exact figures of people affected by this deficit in communication is unknown, lack of information leads to delays in seeking and obtaining care, and increases the inherent risks associated with a urinary catheter. These include: tissue damage, infection, urethritis, catheter encrustation, catheter blockage, long- and short-term incontinence, depression, discomfort and pain.

Communication deficits occur both within and across services: the continence nurse advisor (CNA) within acute care was identified on the practitioner survey as having a central responsibility for education of both other practitioners and patients. Clearly when that position was not filled, and/or the CNA was not available (because of fractional appointment, for example) patients were at increased risk of not receiving the necessary, relevant information and education prior to and up to discharge. In addition, the establishment of clear communication lines between services at discharge was largely felt to be the responsibility of the CNA and the RDNS liaison nurse. Frustration felt by representatives of both services can be traced to the current lack of documentation and protocol to make clear which education and information still needs to be provided for patients.

While a whole-service approach to provision of catheter information and education is called for, specific points of care have been identified as being reliant upon effective communication (see Figure 1). These include:

- decision to insert urinary catheter in acute care;
- insertion of catheter;
- patient/carer management of catheter in hospital;
- discharge planning;
- discharge;
- patient/carer management of catheter at home;
- referral to district nursing services (if needed);
- referral to continence services (if needed);
- changing of catheter;
- review of need for catheter; and
- removal of catheter and trial of void.
Figure 1 – Diagrammatic model of practice

1. Patient in Acute/sub-acute Care
   - Discussion with patient and carers regarding benefits, risks and options
   - Need for urinary catheter recognised
     - Continence Nurse Advisor informed
     - Insertion of catheter
       - Patient taught to manage catheter while in hospital appropriate to cognitive and physical abilities
     - Patient and carers involved in planning, including role of RDNS
     - Discharge planning
       - Referrals to RDNS as necessary
     - Discharge
       - Patient/carer discharged with sufficient materials and information for their needs
     - Catheter change
       - RDNS informed of patient needs regarding change of catheter and drainage bag care
     - Review of need for catheter or planned surgery/procedure if applicable
       - RDNS informed of patient needs regarding change of catheter and drainage bag care
       - Removal of catheter and Trial of Void if necessary
       - Appointment made with private clinician or outpatient clinic and patient and carers aware of when this will be and what is the purpose of appointment
       - Appointment made and patient and carers aware of when this will be and what is the purpose of appointment
There is the potential for fractures in communication to occur along all arrows in the diagrammatic representation of care pathways in Figure 1. The draft clinical tools and patient information/education materials (Catheter Care Booklet, Catheter Discharge Checklist, Catheter Discharge Checklist Guidelines) have been designed to minimise such fractures, with the potential for education and information to be provided in a flexible manner appropriate to the cognition, health and frailty of the patients. Recognition and recording of information and education provision will alert clinicians to patient’s ongoing needs throughout the discharge process.
Education Package and Clinical Tools

The development of the Catheter Care Booklet has been undertaken together with the clinical tools (Catheter Discharge Checklist and Catheter Discharge Checklist Guidelines). This has been in response to the research literature emphasizing the importance of a cohesive patient education program which is undertaken in conjunction with catheterization, discharge from acute and sub-acute care, and transition to community care. This has involved a review of current patient education materials used within the participating services as well as other services. As well, available, relevant literature was retrieved which informed the development of the Catheter Care Booklet and the above tools.

Review of Patient Education Materials

Patient education materials were collated from a variety of services both nationally and internationally. While some of these were requested and received, many others were available via services’ websites. The education materials collated purposefully included those for women and men, those with permanent and temporary urinary catheters, and those designed specifically for urology and non-urology patients. In addition, some information sheets designed for paediatric use were scrutinized.

Collation of materials ceased when no new themes and issues were being identified for consideration for inclusion in the pilot education materials. The main themes and issues were, not surprisingly, reflected broadly in this project’s practitioner and patient/carer surveys based on current literature and practice. The themes and issues in the collated patient education materials were:

- Information regarding what is a catheter (including indwelling and suprapubic)
- How a catheter is prevented from falling out
- Reasons for use of catheter
- The need to change catheters and who is responsible for this
- Diet and fluid intake recommendations
- Hygiene concerns
- How to wear and manage the catheter bag
- Various equipment options and alternatives, including catheter valves
- Differences between leg bags and night bags
- Care of the site for a suprapubic catheter
- Exercise, sexual intercourse and life style concerns for patients needing a catheter
- Recognition and responses to common problems experienced by patients
These themes were considered and included within the pilot Catheter Care Booklet after reference to current practice and research recommendations were addressed in the information. In addition, local information regarding access of catheter supplies, and patient-specific information such as appointments and who to call if problems with the catheter arise is included.

**Input from working group and services**

The Catheter Care Booklet and the Catheter Discharge Checklist and Catheter Discharge Checklist Guidelines have benefited from the discussion and feedback from the wider working group. While staff at CGMC drove this part of the project, collaboration and wider group ownership has been maintained throughout the process. This has included members of the wider project group consulting with their services and staff to enable a broad base of support from each of the services prior to the launch of the pilot.
**Practitioner Workshops**

The practitioner workshops were conducted in August 2004 as a precursor to the pilot. They comprised:

- Introduction of project
- Feedback to staff regarding Patient and Practitioner Surveys
- Introduction of clinical tools and guidelines
- Distribution of discussion paper
- Invitation to participate in the evaluation of the clinical tools and education package

Facilitators were provided with a kit containing:

- Workshop information sheet
- Presentation guide – PowerPoint CD/Floppy disk, transparencies and Flipboard
- Discussion paper – Information for distribution to clinicians involved in the workshops
- Catheter Care booklets
- Catheter Discharge Checklist – pilot form
- Catheter Discharge Checklist Guidelines

The information sheet provided instructions for the conduct of the workshop, the implementation of the pilot and information about the project evaluation process.

The pilot was undertaken at all three services with the clinical tools piloted with patients from a variety of wards within the hospitals, and all appropriate patients within RDNS.

Each service used the same format for the presentation of the project; however scope was allowed for it to be presented in a manner flexible enough to respond to staffing, facility and workload demands. See Appendix 3 for the discussion paper distributed at the workshops, and Appendix 4 for the outline of the workshop programme.

Multiple copies of the Catheter Care booklets, Catheter Discharge Checklist – pilot forms and Catheter Discharge Checklist Guidelines were provided to each of the facilities depending on demand to facilitate the pilot.
Pilot

The pilot of the Catheter Care booklets, Catheter Discharge Checklist – pilot form and Catheter Discharge Checklist Guidelines was conducted during the period August to December, 2004 at Caulfield General Medical Centre, Alfred Hospital and the Royal District Nursing Service. The intended three month period of the pilot was extended as fewer than anticipated clients visited the facilities during this period.

Copies of the completed Catheter Discharge Checklist - pilot form were collected for analysis by the research team.
**Data Analysis**

Data from the Catheter Discharge Checklist were entered into a database and analysed using the Statistical Package for the Social Sciences (SPSS) to provide information about the pilot sample and response rates for each of the checklist sections (refer Appendix 5).

The profile of the sample of patients surveyed in the pilot was typical of those clients generally presenting for catheter care. They were mostly male (67%) with an average age of 77.4 years for males and 47.9 years for females. Most of the catheters were temporary (87%) and for reasons of acute (57%) or chronic (19%) retention. All of the patients were to be cared for in their home after discharge.

The analysis revealed that the Catheter Discharge Checklist was used consistently and appropriately across the services with most of the relevant items achieving a 100% completion rate.

**Clinician interviews**

Key representatives were invited from each of the three health care services involved in the pilot: The Alfred Hospital (acute care); Caulfield General Medical Centre (sub-acute care); and The Royal District Nursing Service (domiciliary care). Each of the informants had previously been involved in the development of the tools, are specialist continence nurses taking a leadership and supervision role in continence care within their institutions, and had discharged and/or admitted patients with urinary catheters during the period of the pilot.

The interviews included a series of questions (see Appendix 6); prompts and additional questions to follow up responses were used as appropriate. Individual telephone interviews were conducted; each of the interviews was taped and interview questions guided the organisation of the data. The main findings of the interviews are detailed below.

It appeared that the guidelines were not relied upon by the key informants from the two hospital services in their own practice. They noted that for staff who were not continence clinicians the guidelines provided a step-by-step process for discharge of patients with a urinary catheter; the guidelines were viewed as important when continence nurses were not available and were a useful tool to alert newer staff to the processes. The discharge checklists were seen as self-explanatory with the guidelines providing extra support for non-specialist staff.

Referrals from wards to the continence nurse in the acute service have risen as a consequence of the pilot. These patients may have previously been discharged without the benefit of continence and/or catheter education and access and referral to specialist services. The increased referral to specialist staff means that the patients and their carers have greater access to more current and relevant information that can be specifically applied to their situation. This contributes to improved patient experiences and outcomes.

Staff members considered that the tools were self explanatory, easy to follow and clear and so were able to follow the guidelines reasonably closely, although some confusion
over funding schemes for equipment provision on the discharge checklist may indicate changes or modifications to the tools may be required (see below).

Each of the key informants recognised the booklet as having a central role in facilitating communication; the discharge checklist was able to complement this communication as a discussion guide during its completion and a prompt for staff for further discussion.

It was thought that patient education was improved by access to the draft booklet. It was recognised that there were few opportunities for many of the patient cohort (frail, elderly population) to undertake education in one episode; the booklet allowed access to an ongoing reference for patients and enabled staff to reinforce information as necessary.

The booklet was seen as particularly useful for patients’ families, especially for family members involved in informal care, allowing back-up information to be readily available to them. The booklet was seen to be more up-to-date and clearer than previously available documents, and made patient education easier to be undertaken.

Carers of frail elderly patients expressed favourable responses to the education booklet. A patient who had previously relied on an older education booklet commented that they preferred the booklet developed for the pilot. It is important that the materials provided to the patients are relevant and comprehensible, as they are more likely to use such materials. The favourable responses to the booklet suggest that it has achieved this status and will contribute to enhance patient outcomes.

Communication was enhanced by the tools and guidelines; liaison nurses were able to use the tools and information they contained. The checklist covered the questions between services relevant to straightforward cases that had been the source of follow-up questions prior to the pilot.

The discharge checklist is also being used in preference to a previous referral form between the hospitals and domiciliary care.

There were no changes suggested for the education booklet and the guidelines however respondents felt that a number of changes to the discharge checklist may further enhance its efficacy, these included:

- Provision for a comments section
- Greater clarity regarding who to contact if patient and/or carer had further questions or concerns
- Greater clarity regarding who would be attending to patient
- Deletion of funding organisation as unnecessary for non-specialist staff

It was further suggested that the equipment information could be simplified on the discharge checklist. While this information was seen as useful, it was predicted that ongoing compliance might be compromised by the current level of detail.

All the pilot tools are still being used by the services, underlining their acceptability with clinicians in each of the services. Translation into community languages would greatly enhance the value of the tools to the services allowing them to be employed for a wider patient cohort than is currently possible.
All of the comments made by clients of the tools were positive in nature. It was considered by the research team that clients, having only a single exposure to the process and therefore no comparison experience, would be unnecessarily disrupted by a follow-up interview as they had expressed a previous unwillingness to be interviewed and were unlikely to contribute any further significant information to the evaluation.

As a result of the various facets of the evaluation process the following recommendations were made for revisions to the documents.

**Independent Evaluation Advisor Team**

A government appointed Independent Evaluation Advisor Team provided feedback on the project materials at a number of reporting stages during the project. Relevant commentary provided on the project materials at the evaluation stage is detailed below.

**Checklist Pilot form**

- The form may benefit from making the need to include a further entry, against all entries titled “other”, more obvious to those completing the form.
- The section title for “7” may benefit from the inclusion of a reminder of the need for staff to complete the latter sections of the *Catheter Care Booklet*.

**Catheter Care Booklet**

- This requires stapling or binding to ensure that the contents remain together.
- Several of the current descriptions relating to “groin/abdomen” may benefit from inclusion of the term “genital” to ensure that the audience receives more specific information.
- Notation should be included on page 21 to indicate that the remaining sections will be completed by the discharging nurse with a reminder to the nurse that all sections must be completed.
- On page 18 the last sentence of the second paragraph could be better written.

**Poster**

- A notation should be made to remind staff to complete the relevant sections within the booklet.

All 3 items require prominent placement of the Australian Government logo with appropriate wording of the funding source.

The checklist analysis and the key informant interviews identified possible revisions for the checklist only; no changes were suggested for the education booklet and guidelines except those above.

**Checklist Analysis**

- Where number is required change so that tick is not necessary, just write in the number.
There is no indication of whether the clinician has skipped a section or it is not relevant to the patient, the inclusion of a “not applicable” category where appropriate would overcome this. Clinician should have to check something in each section to ensure completion of aspects of care.

Key informant interviews

- Provision for a comments section
- Greater clarity regarding who to contact if patient and/or carer had further questions or concerns
- Greater clarity regarding who would be attending to patient
- Deletion of funding organisation as unnecessary for non-specialist staff
- Simplification of the equipment information on the discharge checklist. While this information was seen as useful, it was predicted that ongoing compliance might be compromised by the current level of detail.

As a result the following changes were suggested for the:

Checklist

- An “other” option will be included where appropriate
- A reminder to complete the catheter care booklet will be included in the checklist
- Where numbers are required a number prompt will be included in preference to a tick box
- A “not applicable” option will be included where appropriate
- A comments section will be added
- Funding organization will be removed
- Equipment information will be simplified

Booklet

- Review of wording with specific attention to the comments above.

Poster

- Inclusion of reminder to complete booklet under section 7.

The general format and placement of logos will also be reviewed in accordance with the comments above.

These revised documents were circulated to the reference committee for further comment or endorsement of the changes.
The revisions suggested by the evaluation process and applied to the project documents were endorsed by the reference committee with no further changes other than minor formatting. The project documents were therefore adopted as the final versions for future applications of the materials.
Component 8

Project materials

The final package developed through the project comprises:

Catheter Discharge Checklist

The Catheter Discharge checklist (see appendix 7) is a double sided A4 page consisting of 10 sections. It is designed to gather information about the patient’s personal details, catheterisation issues such as medical reasons and authorisation, plan, type and insertion issues. The checklist also provides provision for catheter care planning and education, equipment and supply and documentation tracking. It has been developed in a concise and simple format to facilitate efficient data entry through tick and number boxes with spaces for comments where necessary.

Catheter Care Booklet

The A5 format Catheter Care Booklet (see appendix 8) has been designed to provide the patient with a portable resource to inform them about their catheter, its care and maintenance. It also provides specific contact details for the patients and their carers should they require assistance in dealing with their catheter.

Catheter Discharge Guidelines Poster

The poster was designed to provide an easily accessible guide for appropriate discharge procedures for patients with catheters (see appendix 9). The flow chart provides prompts that facilitate the discharge interview with the client to ensure that they understand nature of and reasons for their catheterisation. It prompts the clinician to provide them with appropriate supplies and educational information and provide the client with contact advice should they need any additional assistance.

Together these materials provide a comprehensive client discharge and referral resource incorporating procedures for data collection, documentation, education and referral. The project has streamlined previous discharge procedures by amalgamating the documentation, educational material, referral and client contact information into a single integrated process.
**Portability and adaptability**

The general approach used in this project has been to develop resources for patient and carer education along with a systematic approach to developing appropriate documentation and referral advice, without placing significant additional burden on clinicians or their institutions. The patient is provided with advice, resources and specific clinical contacts whilst the clinician is guided through a thorough and systematic process in order to achieve improved clinical outcomes.

This general approach and the types of materials developed through it have myriad applications in a range of clinical settings where the ongoing care and referral of a catheterised patient is required. Most of these novel settings will be able to use the materials developed for this project in their current form or with very little modification. There are however, a number of issues of which prospective users should be cognisant.

The materials have been developed based on the existence of certain personnel and structures within the participating organizations. Sufficiently well informed clinical personnel would need to be available to provide the education components of the program for patients and their carers and outpatient access to such personnel would be necessary. In the absence of such personnel a training programme would need to be incorporated into the implementation phase of the project. Successful implementation of the program may also be impeded through difficulty in accessing personnel, resources and equipment, as may be the case for some of the more rural services.

This programme has been piloted in facilities that are well resourced with specialist staff and established referral networks. For successful implementation in other facilities a number of points need to be considered:

- Identification of key staff within the organization for patient education and outpatient referral,
- Provision of ongoing professional development for staff
- Establishment and maintenance of client referral networks,
- Liaison with service providers such as equipment suppliers, RDNS, nursing homes and extended care facilities
- Ongoing monitoring of checklist data to facilitate responsiveness to changing patient needs and professional staff development
- Computerization of the checklist to facilitate ongoing monitoring. This would assist ease of data entry and have additional advantages for sharing of documentation, flexibility for changing equipment specifications and reduced printing costs.

The model of care described in this project can be considered current best practice. The materials developed through the project are comprehensive and simple to use. They have been adopted by those facilities involved in their piloting for the ongoing care of their clients and are considered to be clinically effective and appropriate for the needs of clinicians, their clients and carers.
With appropriate modification of the documents and resources based on a comprehensive assessment of clinical and patient needs, resources could be developed to provide a systematic approach with improved clinical outcomes in almost any situation where patient referral and follow-up is indicated, either within an institution or between institutions.
This project was designed to respond to current demand for a more coherent approach to patient and carer needs as they move between acute and community settings with catheters in situ. It sought to do this by analysing the existing practices to identify the needs and deficits in the current care models. In light of this information the project sought to meet these needs through the development of appropriate resources and documentation and a systematic approach to their delivery.

A number of difficulties were encountered in the completion of the project mainly in relation to accessing sufficient client data for the development and analysis of the project materials. The changeover of staff in key project positions also had significant impact on the timeframe over which the project has been completed. Staff at each of the organizations involved in the project have been able and willing participants in the project and made invaluable contributions in shaping the outcomes of the project.

The project was undertaken in pursuit of a number of objectives:

- Enhance patient (and carer) experiences and outcomes when discharged from hospital with a catheter in situ
- Identify clinical, educational and other unmet needs faced by patients (and carers) with catheters as they move from the hospital to the community setting
- Develop a best practice model for clinical care of patients (and carers) with catheters as they move between the hospital and community settings
- Instigate change management within hospital and community nursing settings to promote adherence to best practice model
- Evaluate the project with reference to its applicability for other areas of continence care

Each of these objectives has been met by the project through the investigation of existing clinical practice and patient needs and the development of documentation and resources designed to meet these needs. Although a lack of focussed client feedback has impeded the evaluation of specific client experiences and outcomes, there is sufficient anecdotal information as well as improved resources for patients and their carers to expect that these experiences and outcomes have improved. Future projects could seek to collect more information on client outcomes by having practitioners ask clients to answer a few feedback questions as part of their consultation. This would elicit some feedback with minimal disruption to the client or the clinical process and may even enhance the process.

The model of practice that was trialled during this project has been adopted by those facilities that were involved in its evaluation and can be considered to be current best practice. The products of the project have obvious applicability in all similar clinical environments and are probably suited for application in a number of other situations that share some commonality with those facilities involved in this project with very minor modification of the existing materials.
It is recommended that if others are intending to investigate and implement a similar project they obtain accurate estimates of client throughput for the data collection phases of the project, foster ongoing involvement with staff who will be required to participate in the various components of the project and develop contingencies for possible impediments to the timely completion of the project such as staffing changes and the continuing involvement of key facilities.

**Recommendations**

A number of key recommendations for organizations trying to implement similar projects have been identified through the course of this project; there is a need for:

- Identification of key staff within the organization for patient education and outpatient referral.
- Provision of ongoing professional development for staff.
- Establishment and maintenance of client referral networks.
- Liaison with service providers such as equipment suppliers, RDNS, nursing homes and extended care facilities.
- Ongoing monitoring of checklist data to facilitate responsiveness to changing patient needs and professional staff development.
- Clinicians to seek ongoing patient feedback about the processes they are involved in, their experiences and outcomes.
- Computerization of the checklist to facilitate ongoing monitoring. This would assist ease of data entry and have additional advantages for sharing of documentation, flexibility for changing equipment specifications and reduced printing costs.
- Obtaining accurate estimates of client throughput for the data collection phases of the project.
- Fostering ongoing involvement with staff who will be required to participate in the various components of the project.
- Development of contingencies for possible impediments to the timely completion of the project such as staffing changes and the continuing involvement of key facilities.


Transition Care for People with Catheters in Hospitals and in their Homes

You are invited to participate in this project, which is collaboration between The Alfred, Caulfield General Medical Centre Continence Service, Royal District Nursing Service and Victoria University School of Nursing. Information from the study will be used to develop a patient education package and practitioner guidelines to improve the transition process for people being discharged from acute care hospitals with a urinary catheter.

We would be grateful if you could complete this survey and return it in the enclosed envelope. Completion of the survey will take approximately 30-40 minutes.

You will not be personally identified in the survey, and your confidentiality will be maintained throughout The Project.

The Project Team is also seeking to interview a sample of practitioners who have completed the surveys. If you would like to participate in a group interview, please contact Dr Alison Brookes, Melbourne University– Centre for the Study of Health and Society. She will send you further information about the interviews. Alison can be contacted by telephoning 83440826. Interviews will be confidential, and no information that can identify you will be used in the project.

Please note that participation in both the survey and the interviews is voluntary.

Thankyou for your consideration of this project.

If you have any complaints about any aspect of the project, the way it is being conducted or any questions about your rights as a research participant, then you may contact:

Name: Ms Rowan Frew
Position: Secretary, Human Ethics Committee, The Alfred
Telephone: 9276-3848

You will need to tell Ms Frew the name of the project (Transition Care for People with Catheters in Hospitals and in their Homes)
Section One. Please tick the appropriate box for each of the questions: ✓
This section asks non-identifying questions about the practitioner who is completing the survey.

1. Are you:
   A medical practitioner ☐
   A nurse ☐
   Other (please specify) ☐ ........................................

2. Are you employed by:
   An acute hospital ☐
   A sub acute Hospital ☐
   A specialist continence service ☐
   A district nursing service ☐
   Other (please specify) ☐ ........................................
Section Two: Please tick the appropriate box/boxes for each of the questions. Tick as many boxes as necessary:

This section asks about the provision of information about the catheter.

1. Who is primarily responsible for providing information to patients/clients about the need for a catheter?
   - Hospital Nurse
   - Continence Nurse Advisor
   - Hospital Doctor
   - District Nurse
   - General Practitioner
   - Other (please specify)  
     - ……………………………………

In your experience, how regularly is information provided to patients/clients about the need for a catheter?
   - Always
   - Usually
   - Rarely
   - Never

In your experience, do any of the following impact negatively on the provision of information about the need for a catheter?
   - Lack of time
   - Lack of appropriate education materials
   - Lack of staff availability
   - Lack of clarity regarding responsibility for patient education

How do you rate the importance of providing patients/clients with information about the need for a catheter?
   - Very important
   - Important
   - Not important

How satisfied are you with the information currently given about the need for a catheter?
   - Totally satisfied
   - Somewhat satisfied
   - Somewhat unsatisfied
   - Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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2. Who is primarily responsible for providing information to patients/clients about *alternatives to having a catheter*?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify) ........................................

In your experience, how regularly is information provided to patients/clients about *alternatives to having a catheter*?

- Always
- Usually
- Rarely
- Never

How do you rate the importance of providing patients/clients with information about *alternatives to having a catheter*?

- Very important
- Important
- Not important

How satisfied are you with the information currently given about *alternatives to having a catheter*?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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3. Who is primarily responsible for providing information to patients/clients about *when the need for the catheter should be reviewed*?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify)

In your experience, how regularly is information provided to patients/clients about *when the need for the catheter should be reviewed*?

- Always
- Usually
- Rarely
- Never

How important do you rate the importance of providing patients/clients with information about *when the need for the catheter should be reviewed*?

- Very important
- Important
- Not important

How satisfied are you with the information currently given about *when the need for the catheter should be reviewed*?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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4. Who is primarily responsible for providing information to patients/clients about catheter hygiene needs?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify) ……………………………………

In your experience, how regularly is information provided to patients/clients about catheter hygiene needs?

- Always
- Usually
- Rarely
- Never

How important do you rate the importance of providing patients/clients with information about catheter hygiene needs?

- Very important
- Important
- Not important

How satisfied are you with the information currently given about catheter hygiene needs?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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5. Who is primarily responsible for providing information to patients/clients about changing, positioning, wearing and cleaning the catheter bag?

**Changing catheter bag:**
- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify)
- ……………………………

**Positioning catheter bag:**
- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify)
- ……………………………

**Wearing catheter bag:**
- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify)
- ……………………………

**Cleaning catheter bag:**
- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify)
- ……………………………

In your experience, how regularly is information provided to patients/clients about changing, positioning, wearing and cleaning the catheter bag?

- Always
- Usually
- Rarely
- Never
6. How important do you rate the importance of providing patients/clients with information about changing, positioning, wearing and cleaning the catheter bag?

   Very important □
   Important □
   Not important □

How satisfied are you with the information currently given about changing, positioning, wearing and cleaning the catheter bag?

   Totally satisfied □
   Somewhat satisfied □
   Somewhat unsatisfied □
   Totally unsatisfied □

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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7. Who is primarily responsible for providing information to patients/clients about problems or side effects that may be associated with urinary catheters?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify) 

In your experience, how regularly is information provided to patients/clients about problems or side effects that may be associated with urinary catheters?

- Always
- Usually
- Rarely
- Never

How important do you rate the importance of providing patients/clients with information about problems or side effects that may be associated with urinary catheters?

- Very important
- Important
- Not important

How satisfied are you with the information currently given about problems or side effects that may be associated with urinary catheters?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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8. Who is primarily responsible for providing information to patients/clients about *reducing the risk of urinary tract infections*?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify)

In your experience, how regularly is information provided to patients/clients about *reducing the risk of urinary tract infections*?

- Always
- Usually
- Rarely
- Never

How important do you rate the importance of providing patients/clients with information about *reducing the risk of urinary tract infections*?

- Very important
- Important
- Not important

How satisfied are you with the information currently given about *reducing the risk of urinary tract infections*?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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9. Who is primarily responsible for providing information to patients/clients about who to contact for more information about managing his/her catheter?

- Hospital Nurse  
- Continence Nurse Advisor  
- Hospital Doctor  
- District Nurse  
- General Practitioner  
- Other (please specify)  

In your experience, how regularly is information provided to patients/clients about who to contact for more information about managing his/her catheter?

- Always  
- Usually  
- Rarely  
- Never  

How important do you rate the importance of providing patients/clients with information about who to contact for more information about managing his/her catheter?

- Very important  
- Important  
- Not important  

How satisfied are you with the information currently given about whom to contact for more information about managing his/her catheter?

- Totally satisfied  
- Somewhat satisfied  
- Somewhat unsatisfied  
- Totally unsatisfied  

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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10. Who is primarily responsible for providing information to patients/clients about when, where and how the catheter will be removed?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify)

In your experience, how regularly is information provided to patients/clients about when, where and how the catheter will be removed?

- Always
- Usually
- Rarely
- Never

How important do you rate the importance of providing patients/clients with information about when, where and how the catheter will be removed?

- Very important
- Important
- Not important

How satisfied are you with the information currently given about when, where and how the catheter will be removed?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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11. Who is primarily responsible for providing information to patients/clients about the type of catheter used?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify)  

In your experience, how regularly is information provided to patients/clients about the type of catheter use?

- Always
- Usually
- Rarely
- Never

How important do you rate the importance of providing patients/clients with information about the type of catheter used?

- Very important
- Important
- Not important

How satisfied are you with the information currently given about the type of catheter used?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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12. Who is primarily responsible for providing information to patients/clients about *continence care services*?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify) ……………………………………

In your experience, how regularly is information provided to patients/clients about *continence care services*?

- Always
- Usually
- Rarely
- Never

How important do you rate the importance of providing patients/clients with information about *continence care services*?

- Very important
- Important
- Not important

How satisfied are you with the information currently given about *continence care services*?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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13. Who is primarily responsible for providing information to patients/clients about community nursing services for people with urinary catheters?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify)  

In your experience, how regularly is information provided to patients/clients about community nursing services for people with urinary catheters?

- Always
- Usually
- Rarely
- Never

How important do you rate the importance of providing patients/clients with information about community nursing services for people with urinary catheters?

- Very important
- Important
- Not important

How satisfied are you with the information currently given about community nursing services for people with urinary catheters?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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Please list any areas you think are essential to a catheter care education program that are not covered in the above questions. Please use the space over the page if needed.


Please list any issues, which must be considered when developing clinical guidelines for patients leaving acute care with a urinary catheter in situ. Please use the space over the page if needed.


Many thanks for completing this questionnaire. Please return to Janie Thompson Continence Nurse Consultant, Caulfield Continence Service Caulfield General Medical Centre (use internal mail).
Appendix 2 - Patient/Carer Survey

Transition Care for People with Catheters in Hospitals and in their Homes

You are invited to participate in this project, which is collaboration between The Alfred, Caulfield General Medical Centre Continence Service, Royal District Nursing Service and LaTrobe University School of Nursing. The project will be used to improve information given to people being discharged from acute care hospitals with a urinary catheter.

The survey form has a number of different questions. Each question of the survey asks about a different area of urinary catheter care. There is space for you to write comments if you wish; otherwise just tick the relevant boxes.

We would be grateful if you could complete this survey yourself but if this is not possible you should get the person who mainly cares for you to fill it in on your behalf. After completion, please return it using the enclosed envelope. You do not require a stamp to return the survey form.

You will not be personally identified in the survey, and your confidentiality will be maintained throughout the project.

The project team is also seeking to interview a number of people who have completed the survey. If you would like to participate in an individual interview, please contact Dr Alison Brookes, LaTrobe – The Alfred, Research and Clinical Practice Unit. She will send you further information about the interviews. Alison can be contacted by phoning 9276-3708. Interviews will be held in a place convenient for you. Interviews will be confidential, and no information that can identify you will be used.

Please note that participation in both the survey and the interviews is voluntary and will in no way effect the care you receive from The Alfred, Caulfield General Medical Centre Continence Service or Royal District Nursing Service.

Thank you for your consideration of this project.
Section One. Please tick the appropriate box for each of the questions: ☑

This section asks non-identifying questions about the patient and who is completing the survey.

1. Are you:
   - A patient ☐
   - A carer of a patient* ☐

[* If you are caring for a patient, please fill out the survey questions as they would apply to the patient.]

2. Age:
   - 18-40 ☐
   - 41-50 ☐
   - 51-60 ☐
   - 61-70 ☐
   - 71-80 ☐
   - 81+ ☐

3. Sex:
   - Female ☐
   - Male ☐

4. For how long do you expect to need to have a catheter:
   - less than 1 week ☐
   - 1-2 weeks ☐
   - 3-4 weeks ☐
   - More than 4 weeks ☐
   - Permanently ☐
   - Don’t know ☐
Section Two: Please tick the appropriate box/boxes for each of the questions. Tick as many boxes as necessary:

This section asks about the provision of information about the catheter.

The need for a urinary catheter

Who was the main person who gave you information about the need for a urinary catheter (ie. why it needed to be inserted)?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify) ……………………………………
- No-one

How satisfied were you with the information you were given about the need for a urinary catheter (ie. why it needed to be inserted)?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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Alternatives to having a urinary catheter

Who was the main person who gave you information about alternatives to having a urinary catheter?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify) ........................................
- No-one

How satisfied were you with the information you were given about alternatives to having a urinary catheter?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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Review of need for the urinary catheter

Who was the main person who gave you information about when your need for the urinary catheter should be reviewed?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify) 
- No-one

How satisfied were you with the information you were given about when your need for the catheter should be reviewed?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.
Urinary catheter hygiene needs

Who was the main person who gave you information about urinary catheter hygiene needs?

Hospital Nurse  ☐  Continence Nurse Advisor ☐  Hospital Doctor ☐  District Nurse ☐  General Practitioner ☐  Other (please specify) ☐  No-one ☐

How satisfied were you with the information you were given about urinary catheter hygiene needs?

Totally satisfied ☐  Somewhat satisfied ☐  Somewhat unsatisfied ☐  Totally unsatisfied ☐

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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Changing, positioning, wearing and cleaning the urinary catheter bag

Who was the main person who gave you information about changing, positioning, wearing and cleaning the urinary catheter bag?

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<thead>
<tr>
<th>Changing catheter bag:</th>
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<tr>
<td>Hospital Nurse</td>
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<td>Continence Nurse Advisor</td>
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<td>Hospital Doctor</td>
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<td>Continence Nurse Advisor</td>
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<td>Hospital Doctor</td>
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<th>Cleaning catheter bag:</th>
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<td>Continence Nurse Advisor</td>
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<td>Hospital Doctor</td>
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<td>District Nurse</td>
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<td>General Practitioner</td>
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<td>Other (please specify)</td>
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</table>
How satisfied were you with the information you were given about changing, positioning and wearing the urinary catheter bag?

Totally satisfied ☐
Somewhat satisfied ☐
Somewhat unsatisfied ☐
Totally unsatisfied ☐

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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Problems or side effects

Who was the main person who gave you information about problems or side effects that may be associated with urinary catheters?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify)  
- No-one

How satisfied were you with the information you were given about problems or side effects that may be associated with urinary catheters?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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Reducing the risk of urinary tract infections

Who was the main person who gave you information about reducing the risk of urinary tract infections?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify) ...................................................
- No-one

How satisfied were you with the information you were given about reducing the risk of urinary tract infections?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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Who to contact for information

Who was the main person who gave you information about who to contact for more information about managing your catheter?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify)  
  .........................................................
- No-one

How satisfied were you with the information you were given about whom to contact for more information about managing your catheter?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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When, where and how the urinary catheter will be removed

Who was the main person who gave you information about when, where and how the urinary catheter will be removed?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify): [__]  ........................................
- No-one
- Not relevant (permanent catheter)  

How satisfied were you with the information you were given about when, where and how the urinary catheter will be removed?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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The type of urinary catheter used

Who was the main person who gave you information about the type of urinary catheter used?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify)
- No-one

How satisfied were you with the information you were given about the type of urinary catheter used?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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Continence care services

Who was the main person who gave you information about continence care services?

Hospital Nurse ☐
Continence Nurse Advisor ☐
Hospital Doctor ☐
District Nurse ☐
General Practitioner ☐
Other (please specify) ☐ ……………………………………
No-one ☐
Not relevant to my situation ☐

How satisfied were you with the information you were given about continence care services?

Totally satisfied ☐
Somewhat satisfied ☐
Somewhat unsatisfied ☐
Totally unsatisfied ☐

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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District nursing services

Who was the main person who gave you information about district nursing services for people with catheters?

Hospital Nurse  ☐
Continence Nurse Advisor  ☐
Hospital Doctor  ☐
District Nurse  ☐
General Practitioner  ☐
Other (please specify)  ☐  ........................................
No-one  ☐

How satisfied were you with the information you were given about district nursing services for people with urinary catheters?

Totally satisfied  ☐
Somewhat satisfied  ☐
Somewhat unsatisfied  ☐
Totally unsatisfied  ☐

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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How much you should drink (fluid intake)

Who was the main person who gave you information about how much you should drink while you have a urinary catheter?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify)
- No-one

How satisfied were you with the information you were given about how much you should drink while you have a urinary catheter?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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What to do if your urinary catheter becomes blocked

Who was the main person who gave you information about what to do if your urinary catheter becomes blocked?

Hospital Nurse ☐
Continence Nurse Advisor ☐
Hospital Doctor ☐
**District Nurse** ☐
General Practitioner ☐
Other (please specify) ☐ .................................
No-one ☐

How satisfied were you with the information you were given about what to do if your urinary catheter becomes blocked?

Totally satisfied ☐
Somewhat satisfied ☐
Somewhat unsatisfied ☐
Totally unsatisfied ☐

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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Who to contact in an emergency

Who was the main person who gave you information about who to contact about your urinary catheter in an emergency?

- Hospital Nurse
- Continence Nurse Advisor
- Hospital Doctor
- District Nurse
- General Practitioner
- Other (please specify): ……………………………………
- No-one

How satisfied were you with the information you were given about who to contact about your urinary catheter in an emergency?

- Totally satisfied
- Somewhat satisfied
- Somewhat unsatisfied
- Totally unsatisfied

Do you have any suggestions for how the provision of this information could be improved (for example, person giving the information, place and time of information provision, content of information). Please use the space over the page if needed.

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Appendix 3 - Discussion Paper

Introduction

The discharge of a patient from acute or sub-acute care with a urinary catheter *in situ* challenges nursing and medical practitioners and institutions involved in the patient’s care. No less important is the stress and anxiety which may be felt by the patient and his/her informal caregivers. Research suggests that the risks associated with urinary catheter use may be ameliorated by the implementation of a comprehensive patient/carer education program and clear communication pathways between those involved in the provision of care. Literature and local anecdotal evidence have suggested the need for an education program and communication tools that can be incorporated into the discharge planning and transition of patients between acute and sub-acute care to domiciliary nursing. These guidelines are part of such a package of education program and communication tools currently being piloted by The Alfred, Caulfield General Medical Centre and Royal District Nursing Service.

Background

As the importance of patient education – particularly as part of coordinated discharge processes – continues to be recognised within acute and sub-acute services, health practitioners are confronted with the demand to develop accessible information packages in a variety of clinical areas. Those patients with care needs not confined to specialties or wards offer a particular challenge to institutions seeking to ensure optimal inpatient and domiciliary. One such patient cohort are those discharged with a urinary catheter; in any hospital catheterised patients may have a wide variety of diagnoses and morbidities (Roe, 1990).

Patients facing continence challenges while an inpatient for medical or surgical conditions are regularly discharged with a urinary catheter. Patients’ and carers’ need for information regarding catheter care are often underestimated and may be *ad hoc* as the focus remains on the condition prompting initial admission. Emphasising the risk that catheter care may not remain a focus of the inpatient stay was overseas research which found physicians were often unaware that patients were catheterised; this was particularly so if the catheter was no longer needed or inappropriately used (Saint, et al, 2000, Saint, 2002).

Lack of knowledge about appropriate catheter care leaves patients at risk of developing a variety of complications that may seriously compromise their well-being. Effective responses to patients’ and carers’ needs post discharge is further hampered by lack of information and communication relayed between hospital and domiciliary care.

While local figures are not readily available, overseas estimates of the numbers of hospital inpatients with a urinary catheter are between 10 and 12 percent (Getliffe, 1995; Pellowe, 2001). A significant number of these will rely upon a urinary catheter upon discharge and, without adequate education and support from domiciliary nursing are at risk of short- and long-term complications. Overseas figures suggest that around 4 percent of patients are discharged with a Foley (urethral) catheter (Evans, 1999).
Risks associated with urinary catheter use

Risks associated with urinary catheters are numerous and research suggests the need for use only when other management of urinary discharge is impossible, and that use should be for as short a time as possible. While playing an important role in the care of many patients, the use of urinary catheters is also associated with increased morbidity and mortality (Robinson, 2004). Decisions about catheterisation should include patients and carers and have clear timelines for review of the need for the catheter as patient requirements and condition change (Pomfret, 2000). Risks associated with long-term catheter use include kidney stones, epididymitis and scrotal abscess, erosion of the urethra and urethral fistula (Newman, 1998). All patients with a urinary catheter – either short- or long-term are at risk of the following:

Urinary Tract Infection:

Again, while local figures are not available, overseas research suggests that the use of Foley indwelling catheters is associated with approximately 80 percent of nosocomial urinary tract infections. Risk is exacerbated for older patients, those requiring extensive bed rest, and patients suffering from malnutrition. As well, patients with chronic conditions, who have undergone urinary tract instrumentation are at greater risk, as are female patients (McKinney, 1995).

Bacteriuria:

Bacteria may enter the bladder via the urethra meatus, the point where the catheter joins the collection bag and the collection bag's drainage point (Newman, 1998). Reducing the number of disconnections of the catheter and bag may go some way to reducing the risk of bacteria entering the bladder (Newman, 1998). Bacteriuria can lead to urosepsis and septicemia (Newman, 1998). Older patients are at increased risk from bacteriuria – up to 20 percent from a single catheterisation (Cravens and Zweig, 2000).

Urosepsis:

Occurs up to three times more often in catheterised patients; previous practice in irrigating the catheter to wash out bacteria has shown to be ineffective, and may allow more organisms to enter (Newman, 1998).

Urethritis:

Urethritis may be more prevalent in patients with frequent insertion of catheters, resulting in irritation of the urethra (Newman, 1998).

Problems associated with catheter use

A number of problems are associated with catheter use that, while not necessarily increasing risk, are bothersome for patients and carers. These include:

Dislodgement of catheter:

Patients may purposefully dislodge catheters (through confusion, discomfort, or decision to discontinue use) or they may become dislodged by incorrect anchoring leading to pressure and weight inadvertently being placed on the catheter (Newman, 1998). Bladder spasms may also expel the catheter (Newman, 1998).
**Urine leakage:**

Urine leakage occurs in 65 percent of patients, caused by bladder spasm, infection and too large catheter (Newman, 1998). Restrictions on the catheter caused by tight clothing, position of patient, the drainage bag being full, kinks in the drainage system and allergic reaction to the catheter materials may also result in urine bypassing the catheter and causing leakage (Robinson, 2004).

**Effectiveness of patient education**

A review of research of long-term urinary catheter care found that patients had serious deficits in patient understanding of their catheter. Deficits included lack of understanding of how the catheter functioned and where it was positioned in the body, and lack of knowledge of how to care for the catheter and maintain hygiene (Wilde, 1997). In addition, catheter use interfered with patients' social and family relationships due in part to lack of knowledge and education (Wilde, 1997).

Benefits of patients being informed about their health care needs include physiological and psychological outcomes (Cortis and Lacey, 1996). Better adjustment to hospitalisation, increased ability to cope with procedures, quicker recovery from surgery and increased patient compliance with treatment prescriptions are all associated positively with informed patients (Cortis and Lacey, 1996).

For patient education and information sharing to be effective it needs to be presented in language which can be understood, provided in a personalised manner, and allow time for questions and clarification (Cortis and Lacey, 1996). More specifically, patients (and their carers) need information to be able to recognise a possible urinary tract infection, know how to reduce infection, and who to contact promptly if an infection is suspected (McKinney, 1995). While the catheterisation procedure itself may not be complicated, the management of the 'physical, psychological, social and sexual effect on the patient and family' requires that these aspects are acknowledged and included in education and information provided to patients and carers (Pomfret, 2000).

Patient and carer education must be targeted appropriately in recognition of patients' ongoing needs and abilities. Effective education relies on patient/carer manual dexterity and motivation (Marinkovic and Badlani, 2001); both of these needing to be assessed as part of the discharge planning and education program. Further complicating education and information sharing may be the different practices of catheterisation suitable for hospital and home. Patients and carers must understand why these may be different to minimise confusion and aid consistent care during the transition from hospital to home (Rainville, 1994).

Research exploring the concerns of men post radical prostatectomy found that provision of information was critical to health rehabilitation and patient concerns included the need to know how to manage their catheter (Moore and Estey, 1999). In other research most patients being discharged after a prostate resection were found to be uncomfortable about the thought of being discharged with a urinary catheter. These concerns include the involvement of their partners in their catheter care (LeVasseur, Fitzgerald and Bell, 1998).
Catheter Discharge Checklist and Catheter Discharge Checklist Guidelines

The Catheter Discharge Checklist should be completed as part of the discharge process and should be read in conjunction with the Catheter Discharge Checklist Guidelines. These form an important part of the overall education and communication program, allowing staff within the hospital to alert each other and community practitioners of the need for follow up education. Research clearly states that provision of education should begin before discharge (preferably before catheterisation) and be continued in the community (Roe, 1989). The Catheter Discharge Checklist and the Catheter Discharge Checklist Guidelines include information to assist hospital and community staff to decide on appropriate catheterisation practices from options supported by research and practice.

Catheter Care Booklet

Previous examples of catheter education programs based around a patient/carer booklet have been fruitful. While patients and carers have varying levels of interest and motivation, a booklet able to be kept by the patient can enable them to continue to learn over time and as they require information. Consistency between hospital and domiciliary care is enhanced by the use of such a booklet (Roe, 1990).

Australian research states that the provision of written information for later referral enhances self-management and that information relating to addressing potential problems that may arise with catheter use may facilitate patient independence (Fleming, Day and Glanfield, 2000). The need for consistent documentation was recognised as important for follow-up care (Fleming, Day and Glanfield, 2000).

The Catheter Care Education booklet is designed to provide patients with an appropriate resource, enabling them to reduce the risk of the above conditions and alleviate the problems associated with catheter use. Its use will provide clinicians both in the hospitals and the community with a useful starting point for discussion of catheter care with patients and/or carers, as well as enabling them to follow up and reinforce information as necessary.

References:


Appendix 4 - Format for workshop presentations

Transition Care for People with Catheters in Hospitals and in their Homes

Workshop information

Workshop kit
- Workshop information sheet
- Presentation guide – PowerPoint CD/Floppy disk, transparencies and Flipboard
- Discussion paper – Information for distribution to clinicians involved in the workshops
  (please make additional copies if necessary)
- Catheter Care booklets
- Catheter Discharge Checklist – pilot form
- Catheter Discharge Checklist Guidelines

Workshop format
The kit has been designed to provide all the materials necessary to run the workshop and for clinicians and their clients to complete the project requirements.

In dealing with clients, clinicians should provide each client with a copy of the Catheter care booklet and complete the Catheter Discharge Checklist – pilot form. It is assumed that clinicians will want to keep a copy of this form with their client’s records, so a copy will need to be made for data collection and project evaluation purposes. These copies should be held in a secure place until collection can be arranged. It is anticipated that the forms will be collected monthly.

An evaluation of the processes and materials will be conducted with clinicians and clients through telephone interviews towards the end of the data collection phase. Clinicians will be asked to nominate about five clients per site to be involved in the telephone interviews.

The information obtained will be used to highlight any concerns or suggestions that clinicians and their clients may have about the catheter care materials or the processes involved in providing catheter care. Refinements to the materials and processes will be made based on this feedback.
The following data is derived from the completed Catheter Discharge Checklist – pilot forms. The information has been collated to provide a profile of the reasons for catheterisation and the care and education of the patient and the extent to which the various sections of the form were implemented. The completion rate indicates the percentage of forms where all relevant items in that section were completed by the clinician. The high completions scores achieved suggest that the checklist and the information contained in it were useful to both the clinician and the patient.

The sample of patients participating in the pilot comprised 14 males (67%) and 7 females (33%). The average age of the males was 77.4 years (range 61 to 89) and the females was 47.9 years (range 21 – 77).

**Table 1. Reason for Catheterisation**

<table>
<thead>
<tr>
<th>Reason for Catheterisation</th>
<th>N=21</th>
<th>Completion Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Drainage - Acute retention</td>
<td>12</td>
<td>57%</td>
</tr>
<tr>
<td>Drainage - Chronic retention</td>
<td>4</td>
<td>19%</td>
</tr>
<tr>
<td>Drainage - Surgical Trauma</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>Incontinence Management</td>
<td>1</td>
<td>5%</td>
</tr>
<tr>
<td>Other</td>
<td>4</td>
<td>19%</td>
</tr>
</tbody>
</table>

Table 1 shows that the majority of catheterisations (76%) were for the treatment of acute (57%) or chronic (19%) retention problems.

**Table 2. Long Term Plan for Catheter**

<table>
<thead>
<tr>
<th>Long Term Plan for Catheter</th>
<th>N=21, multiple selections possible</th>
<th>Completion Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>Urology Review</td>
<td>9</td>
<td>39%</td>
</tr>
<tr>
<td>Trial of Void</td>
<td>6</td>
<td>26%</td>
</tr>
<tr>
<td>Awaiting further procedure</td>
<td>5</td>
<td>22%</td>
</tr>
<tr>
<td>Permanent Catheter</td>
<td>3</td>
<td>13%</td>
</tr>
</tbody>
</table>

Table 2 shows that the majority of catheters (87%) were temporary and, as Table 3 indicates, of the IDC type (95%).

**Table 3. Catheter Selected**

<table>
<thead>
<tr>
<th>Catheter Selected</th>
<th>N=21</th>
<th>Completion Rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>IDC</td>
<td>20</td>
<td>95%</td>
</tr>
<tr>
<td>SPC</td>
<td>1</td>
<td>5%</td>
</tr>
</tbody>
</table>
Table 4. Person Responsible for Catheter Care at Home

(100% completion rate)
(N=21, multiple selections possible)

<table>
<thead>
<tr>
<th>Responsible</th>
<th>Count</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Patient self caring</td>
<td>10</td>
<td>48%</td>
</tr>
<tr>
<td>Patient and Carer caring</td>
<td>7</td>
<td>33%</td>
</tr>
<tr>
<td>Carer only</td>
<td>2</td>
<td>10%</td>
</tr>
<tr>
<td>Community Carer</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>RDNS</td>
<td>7</td>
<td>33%</td>
</tr>
<tr>
<td>Residential Care</td>
<td>0</td>
<td>0%</td>
</tr>
</tbody>
</table>

The majority of patients were to be primarily responsible for the care of their own catheters at home (table 4).

Table 5. Patient and Carer Education

(85.7% completion rate)
(N=21)

<table>
<thead>
<tr>
<th></th>
<th>Initiated</th>
<th>Completed</th>
<th>Reinforcement</th>
</tr>
</thead>
<tbody>
<tr>
<td>Catheter care</td>
<td>5</td>
<td>7</td>
<td>5</td>
</tr>
<tr>
<td>Drainage bag or valve care</td>
<td>5</td>
<td>6</td>
<td>6</td>
</tr>
<tr>
<td>Catheter problem solving</td>
<td>4</td>
<td>4</td>
<td>9</td>
</tr>
<tr>
<td>Catheter changing</td>
<td>4</td>
<td>4</td>
<td>7</td>
</tr>
<tr>
<td>Equipment access</td>
<td>5</td>
<td>3</td>
<td>7</td>
</tr>
<tr>
<td>Emergency contact</td>
<td>5</td>
<td>4</td>
<td>7</td>
</tr>
</tbody>
</table>

Table 5 indicates the number of clients where patient and carer education was either initiated, completed or required reinforcement. Staff recorded that education was at least initiated in all but two cases. Clients appearing in the initiated category had no entries in either of the other categories whereas all clients in the Completed and Reinforcement categories must have had their education initiated. Education for some items such as catheter changing was not applicable to all patients a record of this was made in two cases.
The following items were used as prompts in a structured interview with clinicians involved in the pilot of the catheter discharge materials. Further, more detailed and specific questioning was pursued with each of the respondents as was relevant to their individual responses.

Prompt items:

- Do you think that the guidelines are appropriate and useful?
- How well do you think you adhered to the draft guidelines during the pilot?
- Did you experience any difficulties implementing the draft guidelines?
- Do you think that the tools helped facilitate communication with the patients?
- Do you think that the tools improved patient education?
- Did your patients make any comments about the tools?
- Do you think that the tools assisted communication between agencies/clinicians? (continuity of care, documentation)
- Would you like to suggest any changes or modification to any of the tools.