



Bladder Management Continence - Clinical Practice Standard

1. Purpose

The purpose of this policy is to establish minimum practice standards for the care and management of continence throughout the WA Country Health Service (WACHS).

Refer to the [Bladder Management Catheter Clinical Practice Standard](#) for guidance on:

- urinary catheterisation
- suprapubic catheterisation
- intermittent and self-catheterisation
- indwelling catheter management
- bladder washout.

Removing unwanted variation in clinical practice and following best practice guidelines has been found to reduce inappropriate care (overuse, misuse and underuse) thus improving health outcomes, reducing preventable harm and decreasing wastage.

Further information relating to specialty areas including Child and Adolescent Health Service (CAHS), Women and Newborn Health Services (WHNS) can be found via [HealthPoint](#) if not covered in this policy.

2. Scope

All medical, nursing, midwifery and allied health staff employed within the WACHS.

All health care professionals are to work within their scope of practice appropriate to their level of training and responsibility.

Further information may be found via [HealthPoint](#) or the [Australian Health Practitioner Regulation Agency](#) as appropriate.

3. Procedural Information

- [Appendix 1 Continence Assessment](#)
- [Appendix 2 Bladder Assessment and Scanning](#)
- [Appendix 3 Urinary Retention](#)
- [Appendix 4 Continence Management](#)
- [Appendix 5 Bladder Training Techniques](#)
- [Appendix 6 Pelvic Floor Muscle Exercises](#)

4. Considerations

- All Spinal Cord Injured patients with bladder dysfunction require referral to Continence Advisor.
- Any patient experiencing total urinary retention requires Medical Officer review.
- Ensure to utilise interpreter services as required.

5. General Information

Urinary Continence: is the ability to store urine in the bladder and voluntarily excrete as required and where socially appropriate¹.

Normal bladder function involves the following features of¹:

- voiding at 3-5 hourly intervals
- nocturia 1-2 times per night

In the absence of:

- urgency
- dysuria
- incontinence
- post void residual.

Urinary Incontinence: is the accidental or involuntary loss of urine from the bladder^{1,2}.

Urinary incontinence may be classified into 5 main types.

A. Stress Incontinence: Urine loss relating to an increase in abdominal pressure exerted on the bladder in the absence of a bladder contraction; may occur during physical exertion such as coughing, running or jumping^{1,2}. Possible causes include:

- Childbirth
- Chronic constipation
- Post urology surgery
- Obesity
- Chronic cough

B. Urge Incontinence: Uninhibited bladder contractions which may result in urgency with or without incontinence^{1,2}.

Other terminology may include: Overactive bladder, Unstable bladder, Detrusor instability. Symptoms may include:

- Urgency
- Frequency
- Nocturia

Possible causes include:

- Acute urinary tract infection (UTI)
- Renal or bladder stones
- Bladder tumours or lesions
- Constipation or faecal impaction
- Benign prostate hyperplasia (BPH)

- Idiopathic
- Neurogenic: i.e. spinal cord lesion; cerebro-vascular accident; multiple sclerosis; Parkinson's

C. Overflow Incontinence: Dribbling and/or continuous leakage associated with incomplete bladder emptying due to either: underactive bladder or bladder outlet obstruction¹. Symptoms may include:

- frequency
- nocturia
- hesitancy
- weak urinary stream (dribbling).

Possible underlying causes include:

Underactive bladder due to central nervous system damage	<ul style="list-style-type: none"> • Diabetic neuropathy • Multiple sclerosis • Spinal cord injury
Bladder outlet obstruction	<ul style="list-style-type: none"> • Urethral stricture • Benign prostate hyperplasia • Constipation
Decreased bladder contractility due to medications	<ul style="list-style-type: none"> • Anaesthetic agents • Anti-depressants • Angiotensin converting enzyme (ACE) inhibitors

D. Functional Incontinence: Urinary incontinence in the absence of a pathological cause.

Possible causes may include:

Impaired	<ul style="list-style-type: none"> • Mobility • Dexterity • Cognition
Environmental issues	<ul style="list-style-type: none"> • Lighting
Toilet facilities	<ul style="list-style-type: none"> • Signage • Access • Location

E. Transient Incontinence: New onset or acute incontinence as a result of reversible or transient factors. Transient incontinence may result in persistent incontinence. Elderly patients may be most at risk, although patients of ages may be affected.

F. Possible causes as identified by the acronym **DIAPPERS**, may include¹:

Delirium	Resulting from medications, surgery or acute illness
Infection	Symptomatic urinary tract infection
Atrophic vaginitis	Post-menopausal urogenital atrophy
Pharmacology	Medications affecting bladder functioning
Psychological disorders	Depression or sleep deprivation
Excessive urine output	Large fluid intake, endocrine disorders or medications e.g. diuretics
Restricted mobility	Arthritic pain, fear of falling, post prandial hypotension, poor mobility aids
Stool impaction	Causing both urinary and faecal incontinence

6. Patient Monitoring

An individualised management plan is to be documented in the patient's health records as soon as practicable, and in relation to the specific requirements for clinical risk prevention and management. At a minimum, the plan must consider:

- Information from patient history and physical examination, including:
 - patient history and presence of comorbidities
 - diagnosis and treatments for clinical conditions
 - medications, psychosocial and cultural factors that could influence patient monitoring.
- Weight loss strategies for patients with BMI greater than 27
- Collaboration with the multidisciplinary team to determine the type and characteristics of presenting incontinence issues
- Any management plan as developed by continence service
- Frequency and type of specific observations
- Patient education and consent e.g. any restrictions to interventions associated with advance health directives (AHD) or similar.

7. Staffing Requirements

Medical officers, nursing/midwifery staff, continence advisors and allied health staff are to follow endorsed policies and guidelines and to seek advice or refer to senior clinicians in area of speciality or to other services as indicated.

Staff are to comply with the specific requirements in alignment with the [WACHS Infection Prevention and Control Policy](#).

8. Clinical Communication

Clinical Handover

Information exchange is to adhere to the Department of Health [Clinical Handover Policy](#) using the iSoBAR framework.

Critical Information

Critical information, concerns or risks about a consumer are communicated in a timely manner to clinicians who can make decisions about the care.

Documentation

Failure to accurately and legibly record and understand what is recorded in patient health records contribute to a decrease in the quality and safety of patient care.

Refer to WACHS [Documentation](#) CPS.

Related Documents / Forms

- [MR120 WACHS Adult Nursing Care Plan](#)
- [MR144 WACHS Fluid Balance Work Sheet](#)
- [MR144P WACHS Neonatal / Paediatric Fluid Balance Work Sheet](#)
- [MR62.16 WACHS Physiotherapy - Pelvic Pain and Continence Assessment](#)
- [MR62.19 WACHS Physiotherapy - Male Continence Assessment](#)
- [MR66.15 WACHS Bladder Diary](#)
- [RC17 WACHS Continence Assessment form and Care Plan](#)
- [RC18 WACHS Three Day Bladder Chart](#)
- [Aged Care Accreditation Standard 2.12 Continence Management Flowchart](#)

Patient / Carer Information

Ensure the following considerations are met relating to any continence management interventions:

- The patient has received information relating to the intended intervention, and has given appropriate consent prior to any continence management interventions.
- Patient identification and procedure matching processes are undertaken.
- Ensure to maintain patient privacy and dignity.
- Offer the presence of a chaperone where appropriate to patient and clinician requirements.
- Provide the opportunity for an accredited interpreter and/ or Aboriginal Liaison Officer where appropriate to the patient's language or communication requirements. (See [WA Health System Language Services Policy](#).)

Relevant patient /carer information can be located via:

- The WA Department of Health "HealthyWA" Internet page titled: [Continence Management and Advice](#). The page includes information on the Continence Management and Advice Service (CMAS)
- [Department of Health and Ageing](#)
- [Continence Foundation of Australia](#)

9. Compliance Monitoring

Evaluation, audit and feedback processes are to be in place to monitor compliance.

Failure to comply with this policy may constitute a breach of the WA Health Code of Conduct (Code). The Code is part of the [Employment Policy Framework](#) issued pursuant to section 26 of the [Health Services Act 2016](#) (HSA) and is binding on all WACHS staff which for this purpose includes trainees, students, volunteers, researchers, contractors for service (including all visiting health professionals and agency staff) and persons delivering training or education within WACHS.

WACHS staff are reminded that compliance with all policies is mandatory.

10. Relevant Legislation

Accessible via: Government of Western Australia ([State Law Publisher](#) or [ComLaw](#))

- *Carers Recognition Act 2004*
- *Disability Services Act 1993*
- *Guardianship and Administration Act 1990*
- *Health Practitioner Regulation National Law (WA) Act 2010*
- *Occupational Safety and Health Act 1984*
- *Occupational Safety and Health Regulations 1996*
- *Privacy Act 1988*
- *State Records Act 2000*

11. Relevant Standards

[National Safety and Quality Health Services \(NSQHS\) Standards](#)

- Edition 2 – Standard 5 Comprehensive Care Criteria 5.4, 5.5, 5.6, 5.11, 5.12, and 5.14

[EQuIP National](#)

- Standard 12 Provision of Care Criteria 12.1, 12.2 and 12.3

[Australian Aged Care Quality Agency Accreditation Standards](#)

- Standard 2.12

12. Related WA Health Policies

- [Clinical Handover Policy](#)
- [Clinical Incident Management Policy](#)
- [Clinical and Related Waste Management Policy](#)
- [WA Health Consent to Treatment Policy](#)
- [National Hand Hygiene Initiative in Western Australian Healthcare Facilities](#)
- [Western Australian Patient Identification Policy 2014](#)

13. Relevant WACHS documents

- [Clinical Observations and Assessments Clinical Practice Standard \(physiological, neurovascular, neurological and fluid balance\)](#)
- [Residential Aged Care Services Policy](#)
- [Bladder Management Catheter Clinical Practice Standard](#)
- [Bowel Management Clinical Practice Standard](#)
- [Documentation Clinical Practice Standard](#)
- [Infection Prevention and Control Policy](#)
- [Patient Hygiene Clinical Practice Standard](#)

14. WA Health Policy Framework

[Clinical Governance, Safety and Quality Policy Framework](#)

15. Acknowledgement

Acknowledgment is made of the previous SMHS / WACHS site endorsed work used to compile this Bladder Management - Continence Clinical Practice Standard.

16. References

1. Getliffe K, Dolman M, eds. *Promoting continence: a clinical and research resource*. 3rd ed. Edinburgh: Churchill Livingstone Elsevier; 2007.
2. DuBeau CE. Clinical presentation and diagnosis of urinary incontinence. *UpToDate*. Waltham, MA: UpToDate; 2011.
3. National Health and Medical Research Council, Australian Commission on Safety and Quality in Healthcare. [Australian guidelines for the prevention and control of infection in healthcare](#). Canberra: NHMRC; 2010:. Accessed 20 October 2017.
4. [Incontinence: 4th International Consultation on Incontinence](#), Paris July 5-8, 2008. In: Abrams P, Cardozo L, Khoury S, Wein A, eds. 4th ed: Health Publications; 2009:.
5. Steggall MJ. Acute urinary retention: causes, clinical features and patient care. *Nursing Standard*. 2007;21(29):42-46.
6. O'Connell B, Ostaszkievicz J, Ski C. [Development and trial of best practice protocol for management of urinary retention in elderly patients in acute and sub-acute settings: final report](#). Geelong, Vic: Deakin University; 2006:.
7. Ostaszkievicz J, O'Connell B, Ski C. A guideline for the nursing assessment and management of urinary retention in elderly hospitalised patients. *Australian & New Zealand Continence Journal*. 2008;14(3):76-83.
8. Barrisford GWS, G. S. Acute urinary retention. *UpToDate*. Waltham, MA: UpToDate; 2012.
9. Selius BA, Subedi R. Urinary retention in adults: diagnosis and initial management. *American family physician*. Mar 1 2008;77(5):643-650.
10. DuBeau CE. Treatment of urinary incontinence. *UpToDate*. Waltham, MA: UpToDate; 2012.
11. Dougherty LLS. *The Royal Marsden Hospital manual of clinical nursing procedures*. 8th revised ed. UK: Wiley Blackwell; 2011.

12. Burgio KL, Borello-France DF. Pelvic floor exercises and behavioural therapy. In: Kreder K, Dmochowski R, Abrams P, eds. *The overactive bladder: evaluation and management*. London: Informa Healthcare; 2007:87-96.
13. Rathnayake T. Urinary incontinence: Prompted voiding. Adelaide, SA: The Joanna Briggs Institute; 2011: JBI Connect +. Accessed 30 May 2013.
14. [Continence Foundation of Australia](#). Accessed 25 October 2017.
15. Australian Government Department of Health - [Bladderbowel website](#). Accessed 25 October 2017.

17. Definitions

Carer	A person who provides personal care, support and assistance to another individual who needs it because they have a disability, a medical condition (including a terminal or chronic illness) or a mental illness, or are frail and/or aged
Patient	A person who is receiving care in a health service organisation

18. Appendices

[Appendix 1 Continence assessment](#)

[Appendix 2 Bladder assessment and scanning](#)

[Appendix 3 Urinary retention](#)

[Appendix 4 Continence management](#)

[Appendix 5 Bladder training techniques](#)

[Appendix 6 Pelvic floor muscle exercises](#)

**This document can be made available in alternative formats
on request for a person with a disability**

Contact:	Program Officer		
Directorate:	Safety and Quality	TRIM Record #	ED-CO-15-92743
Version:	3.00	Date Published:	3 November 2022

Copyright to this material is vested in the State of Western Australia unless otherwise indicated. Apart from any fair dealing for the purposes of private study, research, criticism or review, as permitted under the provisions of the *Copyright Act 1968*, no part may be reproduced or re-used for any purposes whatsoever without written permission of the State of Western Australia.

19. Appendix 1 Continence Assessment

Determining the patient's continence status requires collaboration with the multidisciplinary team to determine the characteristics of presenting continence issues and develop appropriate management strategies.

Initial Continence Assessment

Patient Admission

- Determine patient's current continence status on admission.
- Identify, review and implement current continence management program if appropriate.
- Determine if patient is acutely ill. Reassess as condition improves.
- If No to any of these details proceed to **Four Key Questions**.

Four Key Questions

Ask all patients the following questions:

1. Do you ever have accidents with your bladder or leak urine?
2. Do you find you have to rush to the toilet or are unable to get there in time?
3. Has it been longer than 4-6 hours since you last passed urine?
4. Do you have problems with constipation, diarrhoea or have bowel accidents?

If Yes to any question, proceed to **Initial Assessment Plan**.

If Yes to question 4, refer to [WACHS Bowel Management Clinical Practice Standard](#).

Initial Assessment Plan

- Undertake assessment for appropriate management and/or referral to specialised services:

Perform Urinalysis

- Request patient void and measure contents.
- Undertake dipstick urinalysis, and proceed to mid-stream urine testing as indicated by results.
- If patient presents with urinary tract infection, reassess when treatment is complete.

Post-void Residual Volume

- Assess abdomen for signs of bladder distention.
- Assess perineal skin integrity.
- Check post void residual. Refer to [Appendix 2 Bladder Assessment and Scanning](#).
- If patient presenting with total bladder volume exceeding 500mL prioritise bladder emptying.

3 Day Bladder Diary

- Undertake to determine incontinence type ([Table 1](#)) and commence Appropriate Interventions ([Table 2](#)).
- Analyse bladder diary information to identify patterns in voiding and incontinence in relation to:
- Volume and frequency
- Patient awareness of needing to void and fluid balance status
- Document assessment in patient health record, or in Residential Aged Care utilise the [RC18 WACHS Three Day Bladder Chart](#)

Table 1: Incontinence Type by Bladder Assessment Pattern

Incontinence Type	Residual Volume	Leakage Occurrence	Leakage Amounts	Frequency
Stress Incontinence	Less than 100 mL	When patient coughs, sneezes, strains, or on standing. Aware of need to void. No urgency.	Generally small Less than 50 mL	Usually normal 4-7 times per 24 hours
Urge Incontinence	Amount varies	When patient coughs, sneezes, strains, or on standing. Urgency with little or no warning of need to void. Often unable to “hold on” without leakage.	Small to large	Abnormal Greater than 7 times per 24 hours
Overflow Incontinence Outflow obstruction Underactive bladder	Often large Greater than 200 mL	When patient coughs, sneezes, strains, or on standing. Raised awareness of the need to void. Urinary leakage overnight is a significant factor.	Generally small Less than 50 mL	Abnormal Greater than 12 times per 24 hours
	Large 500 – 2000 mL	May or may not have leakage. Urinary leakage overnight may be present. No awareness of need to void.	Variable May not leak urine at all	Abnormal Will not experience need to void
Functional	Amount varies	May or may not have leakage. May or may not be aware. Urinary leakage overnight may be present.	Small to large depending on ability to access toilet	Unpredictable May void inappropriately

Many patients experience multiple problems relating to incontinence.
Seek further guidance from Continence Advisor for issues relating to identifying Incontinence Type and patient management.

Table 2: Appropriate Interventions by Incontinence Type

Incontinence Type	Aggravating Considerations	Treatment Options	Nursing Interventions
Stress Incontinence	Chronic cough Obesity Medications: Alpha blockers e.g. prazosin	Pelvic floor muscle exercises Oestrogen supplements: atrophic vaginitis Surgery	Liaise with Medical Staff; Continence Advisor or Specialist Physiotherapist Provide appropriate absorbent pads until management plan is effective
Urge Incontinence	Urinary tract infection (UTI) High caffeine intake Low fluid intake for fear of incontinence Constipation/ faecal impaction	Treatment of aggravating considerations: UTI, appropriate fluid intake, bowel management Bladder training techniques Drug therapy with anticholinergics	Liaise with Medical Staff; Continence Advisor or Specialist Physiotherapist Provide appropriate absorbent pads until management plan is effective
Overflow Incontinence Outflow obstruction	Faecal impaction Enlarged prostate Urethral stricture Pelvic organ prolapse	Treatment of aggravating considerations: UTI, Bowel management Surgery Permanent IDC Alpha blockers	Empty patients bladder and manage Urinary retention Liaise with Medical Staff; Continence Advisor or Specialist Physiotherapist
Overflow Incontinence Underactive bladder	Diabetes Pelvic injuries Neurological disorders: e.g. paraplegia, multiples sclerosis, diabetes mellitus	Monitor urinary output and post void residual volume Indwelling Catheterisation or Intermittent / Self-catheterisation	Empty patient's bladder and manage Urinary retention Liaise with Medical Staff; Continence Advisor or Specialist Physiotherapist
Functional	Cognitive function disorders Reduced mobility dexterity Medications: Sedatives, loop diuretics Environmental factors	Improve environment Medication review Bladder training techniques	Liaise with Medical Staff; Continence Advisor or Specialist Physiotherapist Provide appropriate absorbent pads until management plan is effective

Specialised Continence Assessment

Following [Initial Continence Assessment](#) on patient admission referral may be required for specialised assessment and treatment interventions.

Refer to: Abrams, P. et al. 2009 *Recommendations of the International Scientific Committee: Evaluations and Treatment of Urinary Incontinence, Pelvic Organ Prolapse and Faecal Incontinence* in Abrams P. et al. eds [Incontinence: 4th International Consultation on Incontinence, Paris July 5-8, 2008](#) pp.1767-1820.⁴

Physiotherapy Continence Assessment

The following forms should be used for documentation:

- [MR62.16 WACHS Physiotherapy - Pelvic Pain and Continence Assessment](#)
- [MR62.19 WACHS Physiotherapy - Male Continence Assessment](#)

Subjective History

<ul style="list-style-type: none"> • Presenting complaint • Medical history • Medications/Interactions • Surgical history • Obstetric history • Hormonal status • Investigations 	<ul style="list-style-type: none"> • Urinary symptoms • Voiding function/dysfunction • Pelvic organ prolapse • Ano-rectal symptoms • Defecation function/dysfunction • Continence management pads or devices 	<ul style="list-style-type: none"> • Demographic information • Exercise behaviours • Validated evaluation tools: • Quality of life • Symptom severity • Functional activity • Psychosocial factors
---	--	---

Physical Examination

- Visual observation of the perineum and introitus
- Digital palpation of the pelvic floor muscles and connective tissue
- Assessment of muscle quality, strength, function and pain
- Ano-rectal assessment of the anal sphincter and puborectalis muscle
- Real time ultrasound imaging of the bladder and pelvic floor muscles
- Other biofeedback modalities e.g. surface emg; pressure biofeedback
- Uroflowmetry: if any voiding dysfunction reported

Planning and Treatment

- Develop a management plan with short and long term goals for treatment based on:
- The patient's and physiotherapists goals
- Analysis of continence assessment

Implement treatment guided by evidence based guidelines available from:

[Continence Foundation of Australia](#)

[Incontinence: 4th International Consultation on Incontinence, Paris July 5-8, 2008](#)

20. Appendix 2 Bladder Assessment and Scanning

Refer to the WA Health [Prevention of Cross Infection in Diagnostic Ultrasound](#) OD 0404/12 for all cross infection considerations relevant to ultrasound transducers.

- Ensure to decontaminate bladder scan equipment as per manufacturer instructions. Undertake bladder assessment with the first set of observations for all patients following admission, transfer from emergency department and post operatively.
- Undertake hydration status and bladder volume assessment for patients who have not voided within four hours of admission, surgery or removal of indwelling catheter.

Bladder Assessment

- Bladder assessment through abdominal examination is undertaken to assess and determine the⁴:
- Extent of any suspected bladder distention.
- Presence of any surgical scars or palpable masses.

Bladder Scanning

- Bladder scanning is undertaken to determine the volume of urine contained within the bladder either relating to urinary retention or for post void residual (PVR) volume¹.
- Scanning using a specifically designed ultrasound device is a non-invasive alternative to inserting an intermittent catheter for measuring PVR volume¹.
- Bladder scanning is **not** suitable for pregnant women; and patients with the following:
 - Suprapubic region: wounds, sutures/staples, scar tissue and lesions
 - Indwelling catheters
 - Abdominal ascites
 - Large abdominal wounds

Table 3: Bladder Scan Guidelines

Bladder Volume	Reassess Patient	Other
Less than 300 mL	in 2 hours	Review patient's hydration status and continue to assess. Assess sensation to void.
300 to 500 mL	in 1 hour	Arrange urgent review (if bladder volume 400-500mL) Implement Non-invasive Strategies . Assess sensation to void.
Greater than 500 mL	Liaise with Senior Nursing Staff and Medical Officer. Consider inserting an indwelling or intermittent catheter as clinically appropriate.	

Equipment

- Portable bladder scanner
- Alcohol wipes
- Tissues
- Water soluble gel

Procedure

- Explain procedure, and obtain appropriate consent.
- Perform hand hygiene at all appropriate moments throughout procedure.
- Position patient in supine for bladder assessment and scanning procedures.
- Maintain privacy and dignity throughout procedure.

Fluid balance status review

- Calculate hydration status: fluid input (oral + intravenous) *minus* fluid output (urine + wound).
- Consider normal voiding pattern, time of last void and length of time fasting (if applicable).
- Ensure patient is pain free and discuss urge to void.

Bladder assessment

- Examine the patient's abdomen sequentially for: contour; distension; scars; engorged veins; visible peristalsis; masses.
- Auscultate all four quadrants for active bowel sounds.
- Percuss all four quadrants systematically to evaluate abnormal sound.
 - If there is dullness over the symphysis pubis, continue percussing upward and outward to estimate bladder borders.
- Palpate all four quadrants superficially, then deeper to identify rebound tenderness or abnormality.
- To identify a distended bladder begin at the symphysis pubis and move upwards and outwards to estimate bladder borders.
- The distended bladder is palpated as a smooth, round firm mass, extending as far as the umbilicus.

Bladder scanning

- Refer to scanner specific instructions.
- Clean scan head with an alcohol wipe.
- Switch scanner on and select appropriate gender. Select Male option for women who have undergone hysterectomy.
- Palpate the symphysis pubis. Apply generous amount of gel to abdomen.
- Place the scan head midline 3-4 cm above the symphysis pubis.
- Observe scanner for bladder volume. Adjust scan head if inaccurate display visualised.
- On completion of bladder scan assist patient remove gel, redress and reposition.

Decontaminate Scan Transducer

- Switch off bladder scan machine. Wipe water soluble gel from scan head with tissues.
- Thoroughly clean scan head with alcohol wipes.
- Ensure to decontaminate bladder scan equipment as per manufacturer instructions.

Post Procedure for Bladder Assessment and Scanning

- Analyse the assessment and/or scan in relation to the patient's current clinical status.
- Document the assessment and/or scan in the patient's health record.
- Be aware that even if the patient is comfortable and there is no obvious distension, a PVR may still be present due to decreased sensation.
- Continue to monitor the patient according to physical assessment and bladder scan guidelines.

21. Appendix 3 Urinary Retention

Refer to [Bladder Management – Catheter WACHS Clinical Practice Standard](#) in conjunction with this appendix in relation to: Indwelling, intermittent and self-catheterisation.

Urinary retention

- Is the failure to completely empty the bladder⁵.
- It is a common occurrence and can lead to bladder distention with significant outcomes for the patient. Distention injuries are avoidable if the patient's bladder is monitored.
- It may be clinically diagnosed as either^{6,7}:

Acute retention

Is defined as “a painful percussable bladder, when the patient is unable to pass any urine”^{4 p.176}, and may present with symptoms of⁷:

- Urgency or frequency
- Voiding small volumes or dribbling incontinence

Acute urinary retention should be considered an emergency⁵. Failure to empty the bladder can cause excess reflux of urine to the ureters with resulting renal damage and/or dysfunction⁶.

Chronic Retention

Is defined as “a non-painful bladder which remains palpable or percussable after the patient has passed urine”^{4 p.176}.

It requires differentiation from transient voiding difficulties, and may develop to acute urinary retention associated with other factors such as urinary tract infection or constipation⁷.

Causes and Pre-disposing Factors¹

- Patients at risk of urinary retention may include:
- Post-surgery
- Following removal of indwelling catheter
- Acute pain service therapy
- Spinal epidural anaesthetic
- Post urology or gynaecological procedures

Obstruction of the lower urinary tract or below the bladder neck^{8,9}.

Intrinsic causes:

- Enlarged prostate
- Bladder/ urethral stone
- Haematuria with clot retention
- Surgical disturbance of bladder innervation
- Urethral stricture/meatal stenosis/ Paraphimosis

Extrinsic causes:

- Organ prolapse
- Pelvic mass
- Constipation/ faecal impaction

Neurological disturbances can interrupt pathways resulting in urinary retention^{8,9}. Examples may include:

- Spinal cord trauma/ spina bifida/ cauda equine syndrome
- Parkinson's disease/ multiple sclerosis
- Cerebral vascular accident
- Diabetic autonomic neuropathy
- Radical pelvic surgery/ post colorectal surgery

Pharmacological agent interactions:^{8,9} Examples may include:

- Anticholinergic agents e.g. oxybutynin, atropine, amitriptyline
- Antiparkinsonism e.g. levodopa
- Antipsychotics e.g. haloperidol
- Opiates e.g. morphine
- Sympathomimetic agents e.g. pseudoephedrine

Post Void Residual (PVR) volume

- Is the amount of urine remaining within the bladder 10-15 minutes after voiding¹.
- Proper bladder emptying is the result of many factors and may vary from person to person⁷.
- The patient's combined total voided volume plus residual volume are to be considered when assessing the clinical significance of the PVR.
- Consider the following criteria, and in conjunction with the patient's clinical condition with regards to ceasing Trial of Void:
 - Void must be double the volume of the residual urine scanned providing total volume (void *plus* residual) does not exceed 800 mL.
 - Two consecutive residual volumes of Less than 100 mL.

Urinary Retention Management

Management of Urinary Retention will depend on patient assessment outcome. Refer to [Urinary Retention Management Flow Chart](#) and [Appendix 2: Bladder Assessment and Scanning](#).

Non-Invasive Strategies

- Ensure patient privacy and provide comfort.
- If clinically stable, sit patient on toilet/commode or stand out of bed.
- If appropriate, assist patient into warm shower.
- Turn on tap so patient can hear the sound of water.

Urethral Catheterisation

- Ongoing management will depend on amount of residual urine.
- If urethral catheterisation is required to relieve bladder distention, monitor post insertion urine output at 15 minutes and 1 hour.
- Monitoring timeframes:
 - Greater than 500 mL = Indwelling catheter minimum 48 hours
 - Greater than 750 mL = Indwelling catheter minimum 72 hours
 - Greater than 1000 mL = Liaise with Continence Advisor or Medical Officer

Urinary Retention Management Flow Chart⁶

Urinary retention manifests either acutely or chronically and is characterised by:



Urinary retention symptoms that require IMMEDIATE attention:

- Lower abdominal pain and/or discomfort
- Distress or agitation in the cognitively impaired
- Inability to void
- Difficulty to void i.e. straining, dribbling, small voids
- Urinary incontinence



Conduct Bladder Assessment

- Undertake brief patient/ medical history
- Review urinary retention risk factors
- Conduct physical assessment of lower abdomen: inspect, palpate, percuss
- Perform bladder scan to determine PVR/ bladder volume



Distinguishing Symptoms



Acute Post Void Residual
With Pain/ Distress/ Agitation



Plan of Care



Immediately liaise with medical officer



Relieve bladder distention as clinically appropriate:
Indwelling or intermittent catheter



Chronic Post Void Residual
No Pain/ Distress/ Agitation



Plan of Care



Liaise with medical officer to establish clinical significance of the PVR



Clinically significant



Relieve bladder distention as clinically appropriate:
Indwelling or intermittent catheter



Not clinically significant



Monitor for clinical signs and symptoms i.e. observe urine output

Modify and monitor risk factors i.e.

- Improved mobility,
- Bowel management program
- Pain relief
- Administer prescribed medications
- Consider ongoing management i.e. Indwelling or intermittent catheter
- Referral to Continence Advisor

Modify and monitor common risk factors:

- Faecal impaction
- Impaired mobility
- Neurological conditions
- Chronic diabetes
- Medications
- Bladder outlet obstruction
- Spinal injury or disease
- Anaesthesia e.g. general, spinal, epidural
- Surgical manipulation of bladder nerves

Clinical significance of Post Void Residual (PVR) volume:

- There is no professional consensus on a PVR volume that constitutes an upper or lower limit.
- The PVR measurement is one of the many factors to consider in determining treatment options.
- Other factors to consider include:
 - Patient's treatment preference
 - Psychosocial status & quality of life
 - Potential for upper urinary tract damage
 - Type and severity of symptoms
 - Results of investigations
 - Comorbidities & prognosis
 - Underlying pathology

Adapted from O'Connell (cited in SMHS Nursing Practice Standard: For the promotion of urinary continence, 2012).

22. Appendix 4 Continence Management

Refer to [Bladder Management – Catheter WACHS Clinical Practice Standard](#) in conjunction with this appendix in relation to: Indwelling, intermittent and self-catheterisation.

On completion of continence and/or bladder assessment an individual continence management plan may include the one or more of the following:

General Considerations

- [Fluid Intake](#)
- [Environment](#)
- [Skin Care](#)
- [Bowel Management](#)

Urine Containment Strategies

- [Absorbent Products](#)
- [Uridome](#)
- [Intermittent Catheters](#)

Fluid Intake

- Promote adequate fluid intake to prevent constipation, dehydration or urinary tract infection.
- Encourage fluid intake of approximately 2 litres/24 hours unless medically contraindicated.
- Monitor fluid balance chart accurately to objectively verify fluid intake and elimination patterns.
- Educate patient regarding potential diuretic effect of caffeinated drinks:
 - Encourage reduction in caffeine intake¹⁰
 - Drastic reduction in caffeine may cause headache
 - Continue warm caffeinated drinks if required as part of normal bowel regime

Environmental Considerations

- Modify environment to facilitate continence:
 - Provide easy access to commode or toilet
 - Familiarise the patient with the surroundings and layout
 - Provide privacy and dignity when accessing toilet facilities
 - Encourage easily removed clothing

Skin Care

- Assess the patient's skin at groins, inner thighs, perineal and perianal areas minimum daily.
- Initiate wound management plan if required for:
 - Redness or rash
 - Moist shiny skin, skin dryness or skin integrity breaks
- After each episode of incontinence ensure to:
 - Cleanse patient's skin Refer to WACHS [Patient Hygiene Clinical Practice Standard](#)
 - Apply appropriate barrier products as indicated by skin condition

Bowel Management

- Monitor bowel function and consider active management if bowels not open for 3 days.

Absorbent Products

- Ensure to select the most appropriate product to meet patient, staff and organisational preferences for incontinence management.
- Consider the following when selecting an absorbent product:
 - Incontinence type and severity
 - Patient functional ability, preferences and co-morbidities
 - Previous experience of incontinence management
 - Care-giver availability

Uridome

- Uridome is a non-invasive urine collection system for incontinent male patients^{4,11}.
- May also be known as penile sheath¹¹ or external condom drainage system.
- Consider the following when selecting a Uridome:
 - Patient cognitive status, functional ability, preferences and co-morbidities
 - Patient penis size and length suitability; a significantly retracted penis may be unsuitable¹¹
 - Patient genital area skin integrity and existing incontinence management strategies
- Ensure good genital hygiene is maintained.
- Replace Uridome every 24 hours and may be synchronised with washing and showering routines.

Patient Monitoring

- Uridome use may be associated with lower incidence of urinary tract infection in comparison with indwelling catheter use⁴.
- Uridome users require monitoring for⁴:
 - Skin integrity and penile tissue damage
 - Uridome kinking and leaking
 - Urinary tract infection

Equipment

- Appropriate size Uridome
- Non-sterile gloves
- Uridome measuring guide
- Suitable drainage bag: with stand or leg attachment as required
- Patient hygiene requirements: soap, bowl, flannel, towels etc.
- Skin prep swab
- Hair clippers

Procedure

- Explain procedure, and obtain appropriate consent.
- Perform hand hygiene at all appropriate moments throughout procedure.
- Maintain patient privacy and dignity throughout procedure.

- Position patient in supine.
- Wash genital area and trim or guard pubic hair as required.
 - If applicable: Gently retract foreskin, wash and dry glans penis. Reposition foreskin
- Apply skin prep if required, allow skin to air dry.
- Place the sheath at the tip of the penis, ensuring foreskin is pulled forward over glans penis.
- Slowly roll the sheath along the penis leaving a 12mm gap at the tip.
- Apply firm pressure for 10 seconds around the applied Uridome to activate adhesive.
- Connect drainage bag and stand or leg attachment as appropriate.

Intermittent Catheters

- An intermittent catheter is inserted into the bladder to remove urine on periodic basis¹¹.
- Episodic intermittent catheter insertion will be required as appropriate to prevent bladder over-distention and manage incontinence¹¹.
- Refer to [Bladder Management – Catheter WACHS Clinical Practice Standard](#) for Indwelling, intermittent and self-catheterisation.

23. Appendix 5 Bladder Training Techniques

Bladder training is a non-invasive behavioural strategy used to manage symptoms of urgency, frequency and mixed incontinence¹⁰.

Bladder training, as described within this appendix may also be referred to as scheduled voiding regimens⁴, and are often used in conjunction with pelvic floor exercises¹⁰.

Technique	Description
Bladder Calming	<ul style="list-style-type: none"> • Utilise relaxation or distraction techniques to postpone urination¹². • Aims to improve control over urgency, increase bladder capacity, reduce incontinent episodes and improve patient confidence⁴. • Requires patient perseverance over several weeks¹⁰.
Prompted Voiding	<ul style="list-style-type: none"> • Actively reminding the person to initiate voiding at scheduled intervals. • Aims to reduce the number of incontinent episodes and increase the number of patient initiated toileting episodes¹³. • Requires significant caregiver motivation and commitment. • Suitable for patients with cognitive and physical impairment⁴.
Habit Retraining	<ul style="list-style-type: none"> • A toileting schedule matched to the persons usual voiding pattern⁴. • Aims to pre-emptively reduce the number of incontinent episodes. • Requires significant caregiver motivation and commitment. • Suitable for patients with cognitive and physical impairment, who have a consistent pattern⁴.
Timed Voiding	<ul style="list-style-type: none"> • A fixed voiding schedule set at regular times⁴. • Aims to avoid incontinent episodes through regular toileting rather than improve bladder function⁴. • Use temporarily for patients with impaired bladder filling/fullness sensations to avoid over distention e.g. post-epidural, post-natal, post-operative. • Suitable for patients unable to toilet themselves.

Undertake Continence Assessment

- All patients indicated for treatment with bladder training techniques require completion of the [3 Day Bladder Diary](#).
- Analyse the continence assessment to determine usual voiding patterns.
- Once usual voiding patterns are identified apply the appropriate Bladder training technique.

Implement Bladder Training

Technique	Instructions
Bladder Calming	<ul style="list-style-type: none"> • Instruct patient each time an urge to pass urine is felt to: <ul style="list-style-type: none"> ○ Use a bladder calming technique ○ Wait until urge is reduced ○ Go immediately to the toilet • Advise patient to: <ul style="list-style-type: none"> ○ Walk calmly to the toilet, rushing may worsen the bladder sensation¹⁰ ○ Treat each urge the same way.
Prompted Voiding	<ul style="list-style-type: none"> • Prompt the patient to void at intervals consistent with their normal pattern. • Provide positive reinforcement for: <ul style="list-style-type: none"> ○ Continent and self-initiated toileting episodes ○ Correct reporting of wet/dry incontinence pads
Habit Retraining	<ul style="list-style-type: none"> • Toilet the patient at intervals consistent with pattern identified from the continence assessment, and to pre-empt incontinent episodes.
Timed Voiding	<ul style="list-style-type: none"> • Toilet the patient at scheduled intervals e.g. 2 hourly. • If continence pattern emerges refer patient to Habit Retraining technique.

Bladder calming techniques for consideration may also include, but are not limited to:

Technique	Instructions
<u>Pelvic floor muscle contraction</u>	<ul style="list-style-type: none"> • Hold pelvic floor muscle contraction until the voiding urge passes. • If unable to hold contraction long enough, attempt several quick lifts instead. • Use as each time an inappropriate voiding sensation is felt. • Use in conjunction with following techniques listed below.
Breathe Out	<ul style="list-style-type: none"> • Breathe out when urgency first occurs, and continue to breathe normally. • Breathe holding and continued shallow breathing increases bladder pressure.
Distraction	<ul style="list-style-type: none"> • Keep your mind busy with other thoughts and tasks. • The more urgency and the toilet is thought, the more urgency will increase.
Direct pressure	<ul style="list-style-type: none"> • Sitting: on a firm surface e.g. arm of chair, edge of table or crossing legs while sitting in chair • Perineal pressure: applying direct pressure to area between vagina and anus, if privacy permits • Clitoral pressure: place a firm finger/ hand pressure over the clitoris until voiding sensation ceases, if privacy permits

Toe curling	<ul style="list-style-type: none"> • Curl toes downwards as if making a fist. Either one or both feet. • Hold position until the urge has decreased. • Also use distracting thoughts e.g. poem, song, counting backwards • Use with caution if patient experiences foot muscle cramps.
Calf stretches	<ul style="list-style-type: none"> • Keeping the knee straight, pull the foot up towards body. • Hold until the urge has decreased. • This can be undertaken sitting, standing or lying.
Sacral tapping	<ul style="list-style-type: none"> • Tap, rub or press over the sacrum at the base of spine. • Keep tapping, rubbing or pressing until the voiding urge has passed.
Abdominal hollowing	<ul style="list-style-type: none"> • Draw in lower abdomen from below the umbilicus. • Combine with pelvic floor muscle tightening and hold as long as the voiding urge remains. • Don't breath hold.
Acupressure points	<ul style="list-style-type: none"> • Top lip: place one finger in the middle of the top lip at the join between the lip and middle of the nose. Keep a gentle pressure until urge passes. • Ankle: place 3 fingers over the ankle bone on the outside of the leg. Keep pressure until the urge reduces. • Suprapubic: place 4 fingers on the left and right side above the pubic bone and hold until the urge reduces.

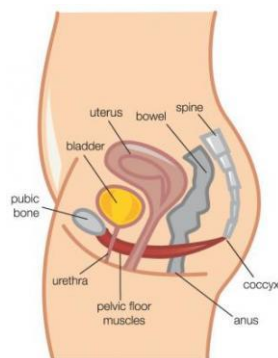
24. Appendix 6 Pelvic Floor Muscle Exercises

Considerations

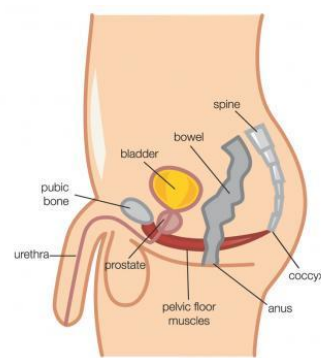
- Pelvic floor muscle exercises (PFME) are a proven non-invasive management technique that is recommended for women with stress incontinence, some men following prostate surgery and to assist with bladder training.
- Performance of the technique on a regular basis is designed to improve urethral resistance through strengthening of the pre-urethral muscles of the pelvic floor, primarily the pubococcygeus muscle¹.
- To enable patients to do pelvic floor muscle exercises effectively it is important that they are able to correctly identify the muscles that will need exercising.
- Patients who are unable to correctly identify their pelvic floor muscles, or do not respond to with the prescribed treatment; require continence assessment by Specialist Physiotherapist.

Pelvic Floor Muscles

Retrieved from: [Continence Foundation of Australia](#) 25/10/2017



Female pelvic floor muscles



Male pelvic floor muscles

Patient information leaflets

Available from:

- Continence Advisor or Specialist Physiotherapist
- Continence Foundation of Australia - [Resources](#)
- Department of Health and Ageing website - [Brochures](#)

Procedure

Refer to the Continence Foundation of Australia for gender specific instructions:

- [Pelvic floor muscles for Women](#)
- [Pelvic floor muscles for Men](#)