

PD Procedures: Invasive Procedures

Preparing a PD Patient



1.0 Practice Standard

The Registered Nurse and the Licensed Practical Nurse who is trained and has demonstrated competency in Peritoneal Dialysis Procedures:

- Must be vigilant in asking patients about planned invasive procedures to ensure that appropriate program specific protocols can be implemented.
- Will contact the nephrologist for specific instructions to prepare the patient for an invasive procedure.
- Consideration of the potential need for changes to dialysis therapy before/after the invasive procedure should be reviewed

Consideration should be given to emptying of the abdomen of fluid before any procedure involving the abdomen or pelvis. Procedures requiring PD patient to be empty or drained may include but not limited to:

- Abdominal ultrasound
- Cardiac catheterization/angiogram with contrast
- Cholangiogram
- Colonoscopy (sigmoidoscopy/proctoscopy)
- Abdominal CT scan
- Cystoscopy/upper GI
- Endoscopic retrograde cholangiogram (ERCP)
- Gastroscopy
- Gynecological procedures
- Iliac dopplers
- Stress test
- Abdominal MRI
- Biopsy (except skin)

Procedures not requiring PD Patient to be empty or drained may include but not limited to:

- Chest x-ray
- Echocardiogram
- ECG
- CT head
- EMG
- MRI (not abdominal)

2.0 Definitions and Abbreviations

Invasive procedures: include but not limited to gynaecological procedures, colonoscopy, hysteroscopy, esophageal stricture dilation, ERCP, dental work, cholecystectomy, and percutaneous endoscopic gastrostomy

Invasive dental procedures: manipulation of gingival tissue or of the periapical region of teeth, or perforation of the oral mucosa

GI: gastro intestinal

GU: genitourinary

3.0 Equipment

Not applicable.

4.0 Procedure and Rationale

	PROCEDURE	RATIONALE
1	Screen patients routinely at clinic to identify planned invasive procedures.	Identifies patients who may require specific preparation such as prophylactic antibiotics or abdomen emptying prior. Also increases patients awareness of importance of communicating planned invasive procedures.
2	Ensure program specific protocols are implemented with all identified invasive procedures. Notify the nephrologist directly if further direction is required to prepare for an invasive procedure.	
3	Provide appropriate patient teaching and patient care specific to the invasive procedure inclusive of special consideration for potential prophylactic antibiotic administration and emptying of the abdomen prior to the procedure.	

5.0 Patient Teaching Considerations

	PATIENT TEACHING	RATIONALE
1	The PD patient should be encouraged to inform the PD program of all procedures prior to the date of the procedure.	Identifies patients who may require specific preparation such as prophylactic antibiotics or abdomen emptying prior. Also increases patients awareness of importance of communicating planned invasive procedures.
2	Specific preparation prior to invasive procedures may include: <ul style="list-style-type: none"> • prophylactic antibiotics • abdomen may be emptied of fluid prior to all procedures involving the abdomen and pelvis 	The administration of prophylactic antibiotics just prior to dental, gastro intestinal and genitourinary procedures can decrease the risk of peritonitis. Minimizes risk of potential perforation and permit easy viewing of specific body areas and functioning.

6.0 Document Considerations

Documentation to include:

- the type of invasive procedure
- date of procedure
- pre invasive procedure care prescribed
- patient instructions provided

7.0 Special Considerations: Interventional Guidelines

(does not replace individualized care and clinical expertise)

ISPD work group opinion (2005, 2011):

- Invasive gastrointestinal procedures may infrequently cause peritonitis in PD patients.
- Certain procedures – including colonoscopy hysteroscopy dental work and cholecystectomy can lead to peritonitis. A recent retrospective study found that the risk of peritonitis after colonoscopy without antibiotic prophylaxis was 6.3%, colonic biopsy or polypectomy did not appear to further increase the risk.
- A single oral dose of amoxicillin (2 gm) 2 hours before extensive dental procedure is reasonable although there are no studies to support this approach.
- Antibiotics such as ampicillin (1gm) plus a single dose of aminoglycoside with or without metronidazole given iv just before the procedure may lower the risk of peritonitis.
- Recommends that the abdomen be emptied of fluid before any procedure involving the abdomen or pelvis including colonoscopy, renal transplantation ,cholecystectomy and endometrial biopsy.

- Pediatric research findings are the same with reduced antibiotic dosing.

8.0 References

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Warady, B., Bakkaloglu, S., Newland, J., et al. Consensus guidelines for the prevention and treatment of catheter related infections and peritonitis in pediatric patients receiving peritoneal dialysis: 2012 update. Peritoneal Dialysis International 2012; 32: S32 - S86

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