



## SCIO #PEEFORFREE 2020 REPORTS

Here is a quick summary of three new background papers setting the content for the #peeforfree Town Halls on the access and affordability of medical supplied in Ontario.

## A. Executive summary: Systematic review of economic analysis of catheters for individuals with spinal cord injury | 2020 | Unpublished Prepared by Brian Chan, Min Xi

Last November, a scientific literature search was initiated to identify publications in peer reviewed journals that conducted an economic analysis (i.e., cost/cost-effectiveness studies) on intermittent catheters in the spinal cord injured population. The search included all catheter types. A medical librarian searched five databases from inception until November 2019: Medline, EMBase, Cochrane Database of Systematic Reviews, CINAHL and Emcare.

The search identified 370 papers. After title and abstract screening, 22 articles underwent full text review. We ultimately included 7 economic evaluations studies. An additional economic evaluation conducted by Health Quality Ontario was also included in the review.

The Drummond and Consolidated Health Economic Evaluation Reporting (CHEERS) checklists for economic evaluations were used to evaluate the quality of reporting. Overall, the studies were well reported. However, most of the studies did not clearly state or justify the perspective of the analysis or justify the type of economic evaluation used in the study. The studies included in our review reported various conclusions. Five studies observed hydrophilic catheter to be cost effective and two studies found hydrophilic catheters to be not cost effective compared to non-coated catheters (assuming multiple use of non-coated catheters). One study estimated that hydrophilic catheters reduced long-term health care costs compared to non-coated catheters. One study found gel reservoir to be cost effective compared to multiple use non-coated catheters.

The next steps in our systematic review include examining the different study models, the major model assumptions, strengths and weaknesses and gaps in knowledge.

## B. Clean Intermittent Urethral Catheterization in Adults: Canadian Best Practice Recommendations for Nurses | 2020 Prepared by Cathy Harley

The Clean Intermittent Urethral Catheterization in Adults | Canadian Best Practice Recommendations for Nurses are the result of a collaboration between Nurses Specialized in Wound, Ostomy & Continence Canada (NSWOCC), Canadian Nurse Continence Advisors (CNCA), Urology Nurses of Canada (UNC) and Infection Prevention and Control Canada (IPAC Canada). The document assists regulated professional nurses in diverse practice settings to provide evidence-based care to adults requiring intermittent urethral catheterization. The review panel consisted of expert nurse representatives from each of the four collaborating associations.

The four collaborating associations have sought to contextualize the guidelines developed by others. We recognize the difference between the rigour of evidence in a guideline with those of recommendations such as these, which include the opinion of the authors. A systematic review of the literature and evidence grading complement the recommendations presented in other guidelines.

Some catheters are manufactured for multiple use, while others are manufactured for single use. A single use catheter is licensed by Health Canada on the basis that it is to be used only once and then disposed after use. Single use catheters are not designed to be re-used and it is strictly against the original equipment manufacturers instructions. The re-use of single use catheters is a contentious and evolving subject. The collaborating associations recognize that from professional and practice liability perspectives, they are unable to support the re-use of catheters licenced for single use.

It is envisioned that these best practice recommendations will help guide qualified nurses in Canada to provide education and improve patient outcomes for adult intermittent urethral catheterization.

http://nswoc.ca/wp-content/uploads/2020/05/Clean-Intermittent-Urethral-Catheterization-Adults-for-Nurses-BPR-May2020-Ir.pdf

## C. Canadian Urological Association | Best Practice Report on Catheter Use | 2020 | Published Prepared by Dean Elterman

Neurogenic lower urinary tract dysfunction (NLUTD) is associated with increased risk of recurrent urinary tract infections, stones and compromised kidney function. Management of neurogenic bladder dysfunction has an incredible economic burden on health care system and quality of life. Assisted bladder drainage remains the cornerstone for urological management of the neurologically impaired patient. Various approaches have been described to manage neurogenic lower urinary tract dysfunction in neurological population including clean intermittent catheterization, indwelling urethral catheters, suprapubic catheterization along with pharmacotherapy. Improving patient quality of life and social rehabilitation have become a priority for the urological management of the neurological patient.

The best practice report provides a brief and comprehensive discussion of studies examining IC in the management of NLUTD. It is based on data obtained from numerous published meta-analyses and original studies identified through literature search. The narrative review concentrates on systematic reviews, related guidelines and comparative studies. Articles were reviewed using methodology consistent with GRADE tool. This best practice statement addressed similar subject matter and scope that is of significance to the Canadian urology practice. The report discusses the available evidence and formulate a best practice report to address current management pathways for NLUTD using IC. It pays specific attention to the current best evidence of the available techniques, design, material, and practices of intermittent self-catheterization and its position in the treatment pathway. Discrepancies are highlighted and discussed in the context of patient reported outcomes and health economics.

Intermittent catheterization is the gold standard for the management of NLUTD. Optimal catheter material, cleaning method and/or catheterization technique, remain a controversial topic in urology. The preferred IC strategy varies by settings and practices. There is no evidence that there is one best catheter for all patients with NLUTD. Reuse of catheters are still considered in different clinical practices despite concerns regarding efficacy, and compliance with cleansing techniques. IC using single-use sterile catheter remains the optimal strategy until emergence of new evidence supporting multiple-use catheters. Long-term cost-effectiveness of single-use HC or UC catheters was established from the perspective of several international healthcare systems. Debate continues to linger regarding the best catheter material and/or technique in which upper urinary tract deterioration can be prevented while minimizing treatment-related morbidity.