

# Needleless for dialysis central vein catheter for patients and staff safety

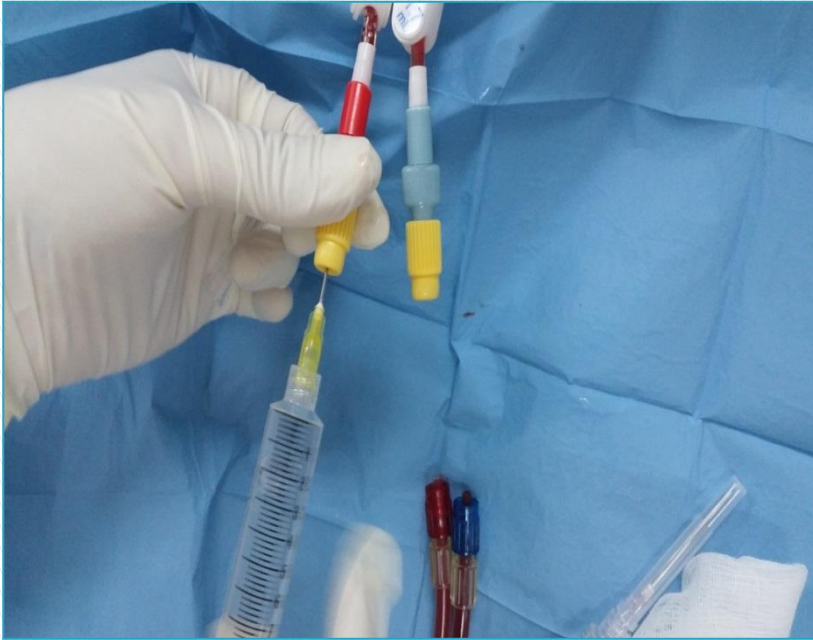
Yanovsky Alexander; Bernshtein Tatiana;  
Michaelashvili Lea; Shwarz Lina

Hemodialysis unit, Nephrology dept.,  
Soroka university medical center, ISRAEL

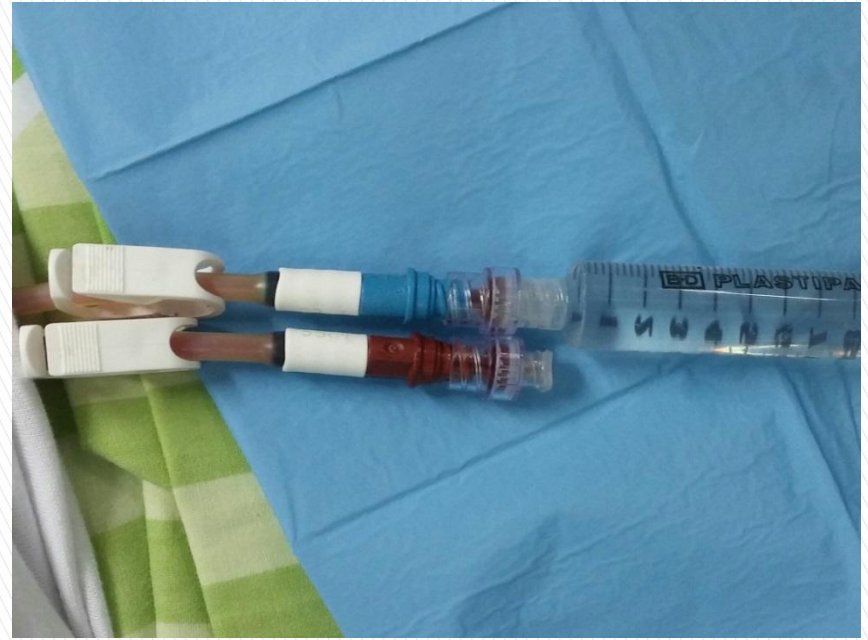
# Introduction

Central line related blood stream infection (CLABSI) is one of the most common fatal complications among hemodialysis patients especially when central venous catheters (CVCs) are used as vascular access in older patients.

# Before and after needleless



Previously, in our hospital-based unit, lock solution was injected through the catheter cup.



To prevent the possibility of needlestick injury the needleless Luer lock device was introduced.

# METHODS

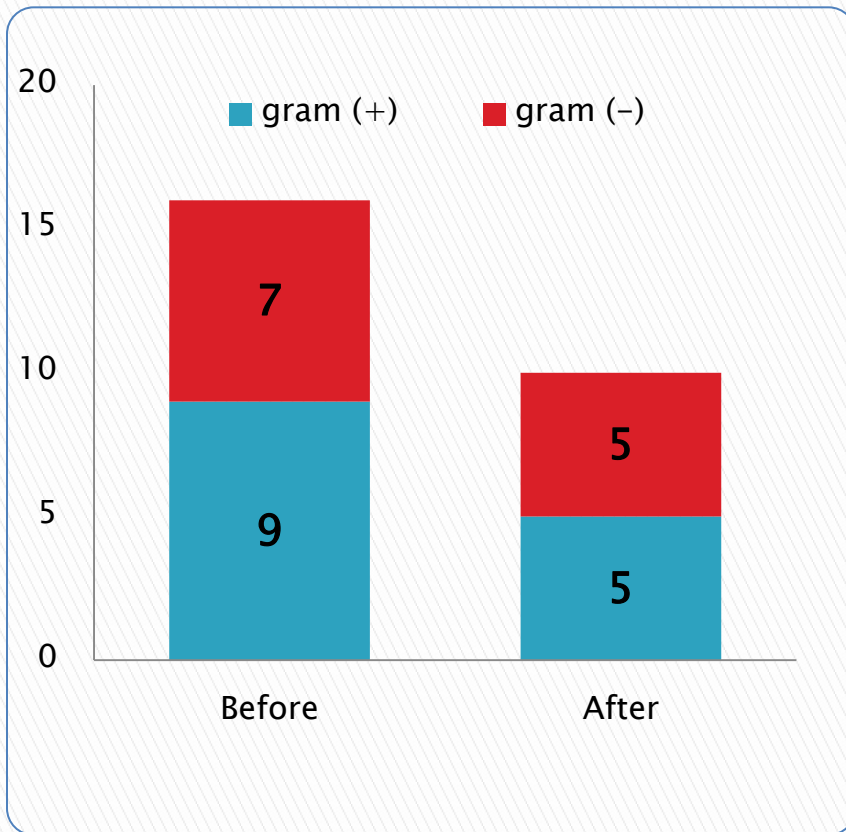
## ▶ Needleless for Split septum Luer lock

- Blood to flow at 300 ml/min
- Prevents catheter occlusion
- Prevents venous pressure or collapse

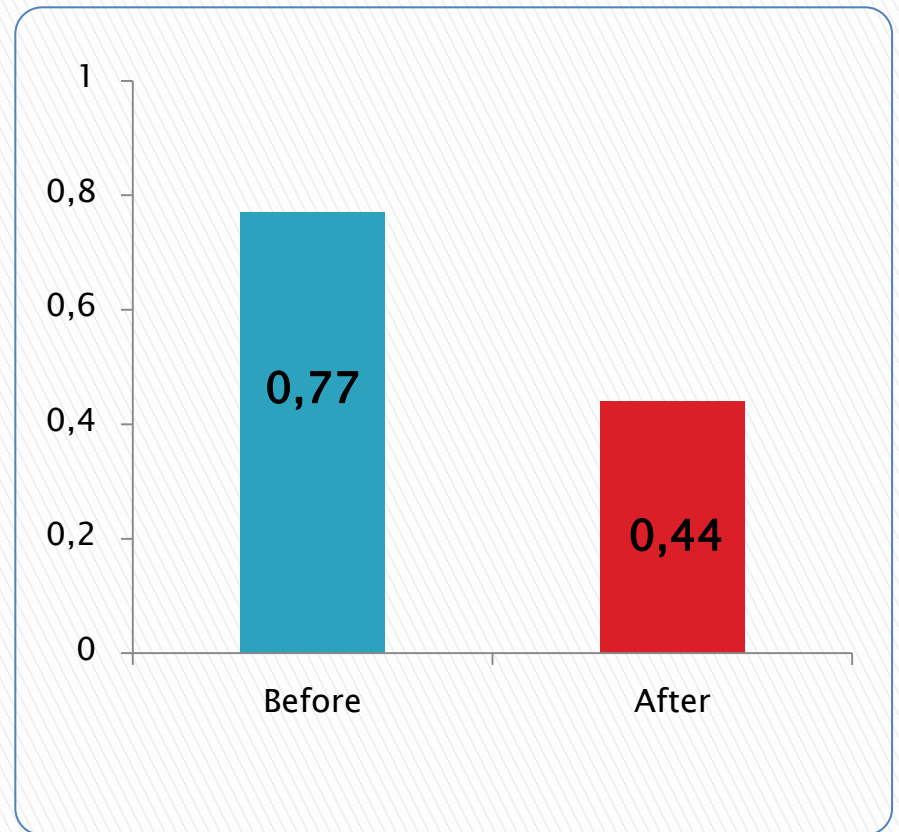


- ## ▶ CLABSI among chronic hemodialysis patients with cuffed CVC was evaluated 24 months before (1st period) and 24 months after (2nd period) needleless was introduced into our hemodialysis unit.

# Results



**Gram stain in CLABSI before and after needleless lock**



**CLABSI events per 1,000 catheter days during periods before and after needleless lock**

# Conclusions

The change in practice has resulted in a reduction of incidents of CLABSI as well as needlestick injuries to the staff.

