Our data indicate that the incidence of infections caused by CV catheters was significantly reduced using povidone-iodine; therefore, we recommend this procedure for routine administration of chemotherapy” Sugiyama et al (2018).

Abstract:

BACKGROUND: Central venous (CV) catheters are required for the administration of chemotherapy. However, they may become a source of life-threatening infections of the bloodstream. The most effective technique to disinfect the port of a CV catheter has not been established.

METHODS: We report the data obtained between April 2008 and March 2010 using 83% ethanol (Period I) and between April 2010 and March 2014 using 10% povidone-iodine (Period II) to sterilize the access port. The study participants received chemotherapy or autologous/allogeneic stem cell transplantation at our institution.

RESULTS: No significant difference was observed between patient characteristics during the two periods, such as diseases, median age, and the period of neutropenia. The incidence of positive blood cultures during Periods I and II were 18.5% (31/168) and 11.4% (40/350) (p = 0.041), respectively. The incidence of catheter-associated bloodstream infection in blood cultures was present in 11.9% (20/168) and 6.3% (22/350) (p = 0.043). Bacillus cereus infection was not detected during Period II.

CONCLUSION: Our data indicate that the incidence of infections caused by CV catheters was significantly reduced using povidone-iodine; therefore, we recommend this procedure for routine administration of chemotherapy.

You may also be interested in...

Reference: