



Study on device utilization ratio in ICUs in a hospital



Introduction

Device utilization ratio (DUR) is the proportion of patient days for which a certain device is used. DUR is specific to a certain device: Ventilator, Urinary catheter & Central venous catheter

DUR=Number of device days/Number of patient days

Objective

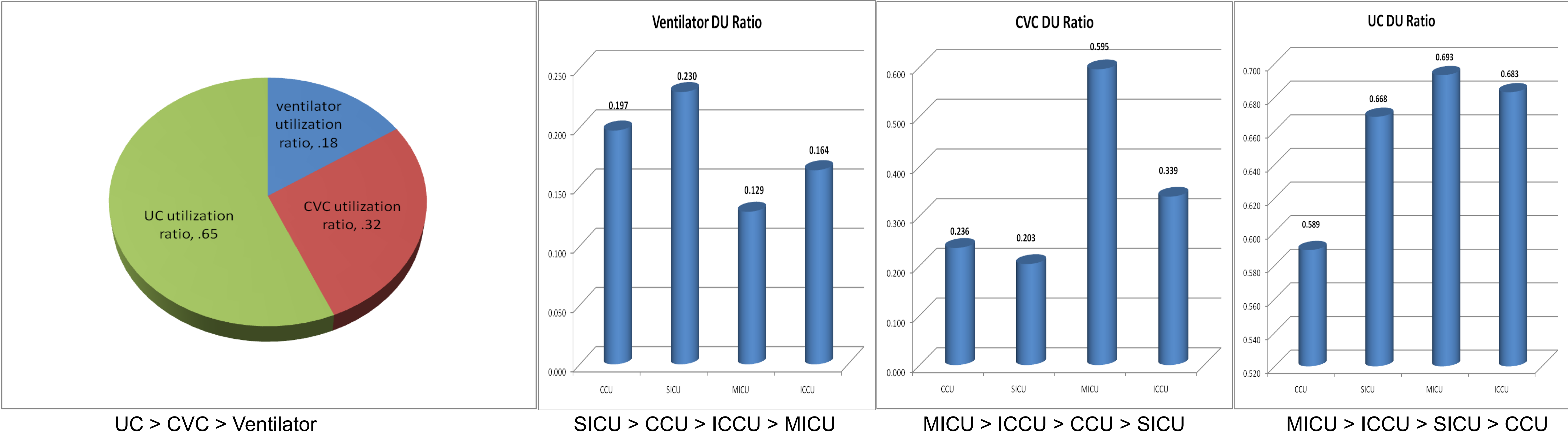
To determine the DUR in ICUs in sterling hospital, Vadodara.
To compare the DUR of Sterling hospital with Asiatic and Global hospitals.

Methodology

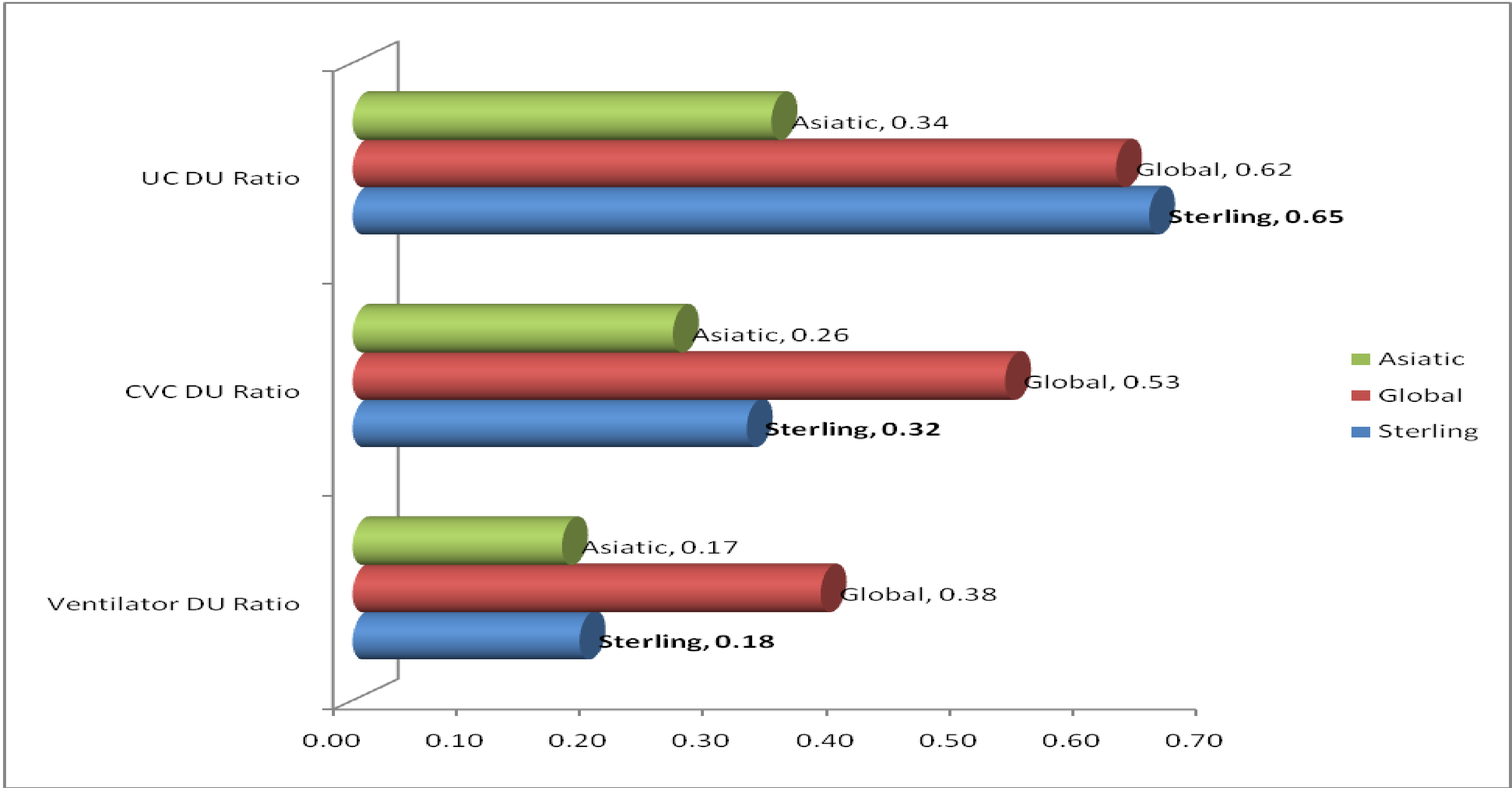
Study Time- 20th April -20th May 2016
Study Design- Prospective comparative study
Study Place- Sterling Hospital, Vadodara
Study Population-Data was collected from 105 patients admitted in ICUs during 1 month of study .
Study Tool-A specially designed Performa

DUR in ICUs in sterling hospital

Comparision b/w DUR of ICUs in sterling hospital



Comparision of Sterling Hospital device utilization ratio data with Asiatic and global hospital device utilization data



UC DUR= STERLING ~GLOBAL > ASIATIC
CVC DUR = GLOBAL > STERLING ~ASIATIC
VENTILATOR D UR= GLOBAL > ASIATIC~STERLING

Conclusion

From study, it was concluded that
Urinary catheter utilization is high and ventilator utilization is low in ICUs in sterling hospital, vadodara.
DUR in Sterling Hospital ICUs is comparable to DUR in Asiatic Hospitals and less than Global hospitals except DUR for UC.

Recommendations

- Utilisation of a particular device as per infection control protocols and guidelines.
- Every device must be assessed everyday by treating consultant for requirement of that particular device.
- Avoid unnecessary and prolonged usage of devices.