

Conclusion

- **Low 90-day mortality rate (0.13%)**
- **No patients died of Prostate cancer within 90-days of surgery**
- **Cardiac cause of death most common within 90-days**
- **Higher univariate 90-day mortality for RRP compared to RARP**
- **Higher rates of VTE related deaths in the RRP group**

Introduction

According to the Swedish Cause of death register (CDR) about a third of the patients who die within 90-days of an Radical Prostatectomy (RP) die of PC specific death. It is highly unlikely that these patients would die of a metastatic disease due to the nature of Prostate Cancer at the time of surgery.

Aim

To validate the cause of death registered in the CDR by chart review and to evaluate mortality rates, causes of death and differences due to type of surgery within 90 days of a RP in localized PC

Method

Through the National Prostate Cancer Register of Sweden (NPCR), we identified all men registered undergoing RP between 1st of Jan 1998 – 30th of June 2018 and died within 90 days of the RP. Medical records from the surgery and from the time of death as well as autopsy reports were obtained. The information provided from NPCR and Prostate cancer database Sweden (PCBaSe) was compared with the data from the medical records

Results

- 44 790 men underwent RP with a total 90-day mortality of 0.13%
- 28% died of PC according to the CDR but no patients had metastasis at the time of death according to the chart review
- The most common causes of death in the chart review was Cardiac disease (28%) and venous thromboembolic events (VTE) (19%).
- The 90-day all-cause mortality was 0.09% for Robot Assisted Laparoscopic radical Prostatectomy (RARP), and 0.18% for Retropubic Radical Prostatectomy (RRP) RR 0,53 (95% CI 0.30-0.92, p=0.02) (Univariate).
- The mortality decreased over the time period RR 0,54 (95% CI 0.32-0.90, p=0.02) and RARP was performed more in later in the study period.
- There was a non-significant higher rate of VTE-related death within 90 days after RRP compared to RARP (p=0.066).

