

ROBOTIC SURGERY AND OUTCOMES IN MORBIDLY OBESE WOMEN (BMI >40) WITH ENDOMETRIAL CANCER

Authors: Natasha DSouza, Michael Alvin Floreskou, Katelijin Sap, Brett Winter-Roach, Bridget Decruze, Michael Smith, Eva Myriokefalitaki

Institution: The Christie NHS FT, Manchester, UK

INTRODUCTION

Endometrial cancer is the 4th most common cancer in women in the UK and obesity is the primary cause of around 1/3rd of these cancers. We aimed to review safety and short-term outcomes of robotic surgery for morbidly obese women (BMI ≥ 40 kg/m²) undergoing robotic surgery for endometrial cancer.

MATERIAL AND METHODS

Prospective data collection of all robotic procedures performed at our centre, The Christie NHS Foundation Trust between 1st July 2014 and 30th April 2021.

Inclusion criteria: women with BMI >40 kg/m² who underwent robotic surgery as part of their treatment of endometrial cancer.

RESULTS

PATIENT PROFILE / CHARACTERISTICS



n=92	Mean (range)
Age (years old)	62 (28 – 88)
BMI (Kg/m ²)	47.2 (40 – 66)

We identified 71% morbidly obese (BMI >40 kg/m²) 25% super morbidly obese (BMI >50 kg/m²) and 4% super super morbidly obese (BMI >60 kg/m²).

Co-morbidities

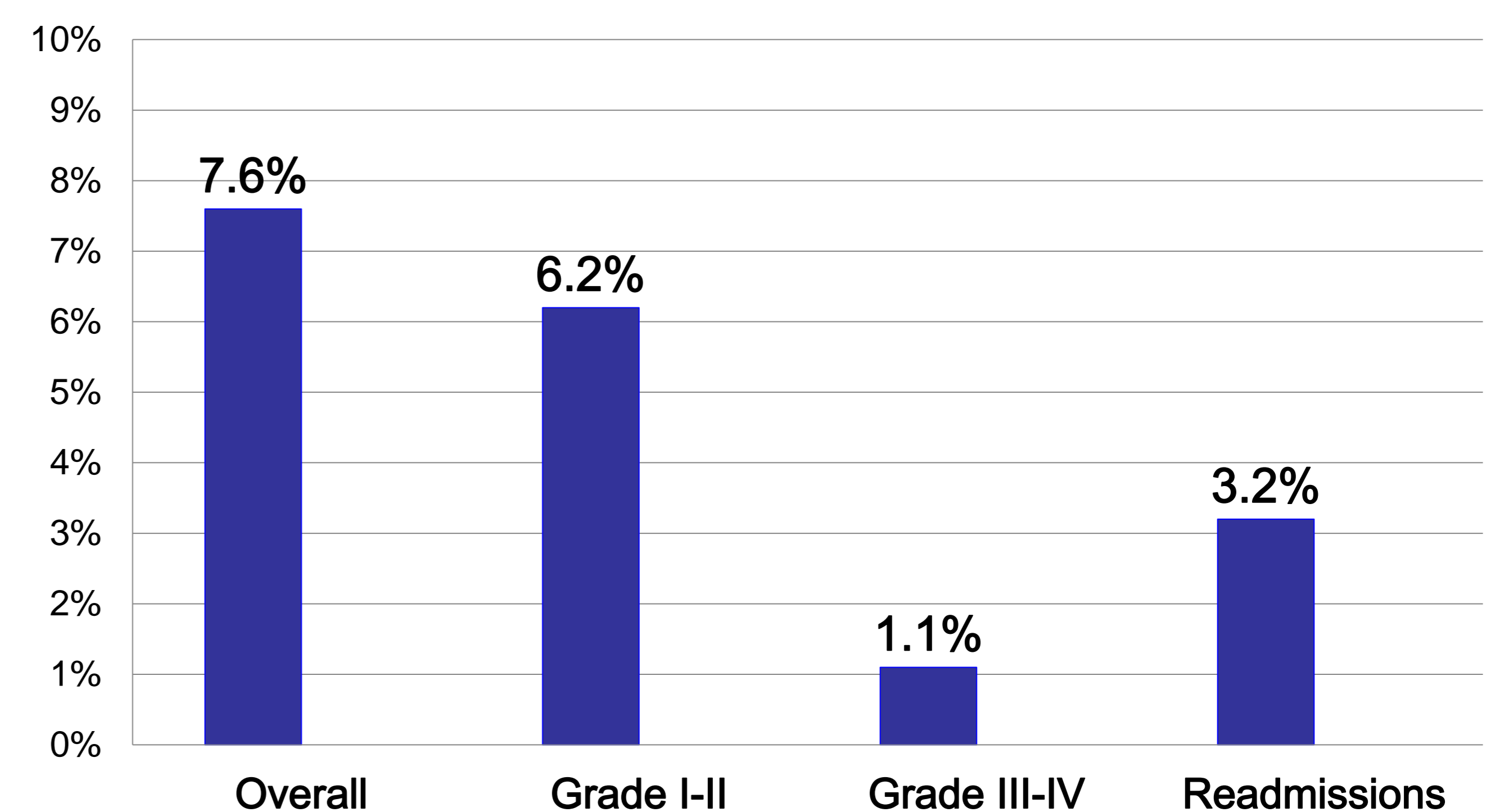
ECOG ≥ 2	47.30%
Previous abdominal surgery	67.50%
COPD / asthma	66.70%
Diabetes mellitus	38.70%
Cardiovascular disease	66.70%

SURGICAL OUTCOMES

n=92	
Pelvic Lymph node dissection	51%
Mean Lymph node count	17.2 LN



COMPLICATION RATE



DISCUSSION

Mean length of hospital stay was 2 days, mainly attributed to significant comorbidities and critical care postoperative monitoring/review and mobility issues/discharge care package. There were no deaths. Conversion rate to laparotomy was 3.2%; (2 patients: BMI 55kg/m² and 66kg/m²). This was significantly higher compared to the 0.5% conversion rate for any other endometrial cancer treated robotically in our Centre, same period. The reasons for conversion included poor tolerance of Trendelenburg position and obstruction of visual field by bowel. Two patients required re-admission for wound infections and one for a mini-laparotomy hernia.

CONCLUSION

Robotic surgery is feasible and safe with a low postoperative complication rate, ensuring appropriate oncological staging for morbidly obese patients BMI ≥ 40 kg/m² with endometrial cancer.

DISCLOSURE

The Christie NHS FT is an accredited training centre for robotic surgery in Gynaecological Oncology. Mr M.Smith and Miss E. Myriokefalitaki are proctors for Intuitive/DaVinci Robotic system

REFERENCES

- [1.https://www.cancerresearchuk.org/about-cancer/womb-cancer/risks-causes](https://www.cancerresearchuk.org/about-cancer/womb-cancer/risks-causes)
- O'Malley DM, Smith B, Fowler JM. The role of robotic surgery in endometrial cancer. *J Surg Oncol.* 2015 Dec;112(7):761-8.
- Wang J, Li X, Wu H, Zhang Y, Wang F. A Meta-Analysis of Robotic Surgery in Endometrial Cancer: Comparison with Laparoscopy and Laparotomy.
- <https://digital.nhs.uk/data-and-information/publications/statistical/health-survey-for-england/2019>