Parallel Session 1(B): Video Session

Abstract Titles

Robotic (Trans-peritoneal and Retroperitoneal approach) versus Laparoscopic Adrenalectomy for Phaeochromocytoma: Step-by-Step Technique of First Irish experience

S. Croghan[1], C. Nix[2], S. David[1], N. Nabi[1], C. Albu[1], J. Khan[1], D. McNicholas[1], Z. Ashraf[1], G. Nama[1], M. Akram[1], S. Giri[1]
[1]Department of Urology and Robotic Surgery, University Hospital Limerick, St Nessan's Road, Dooradoyle, Limerick, V94 F858, Ireland; [2]Department of Anaesthesia, Critical Care & Pain Medicine, University Hospital Limerick, St Nessan's Road, Dooradoyle, Limerick, V94 F858, Ireland

Introduction: Recent evidence supports the use of minimally invasive robotic surgery for the surgical management of adrenal masses. Our aim is to describe a current step-by-step technique of robotic adrenalectomy (RA) and to compare its outcomes with those of laparoscopic adrenalectomy (LA).
Methods: Data were retrospectively reviewed from a prospectively maintained database. 20 patients underwent adrenalectomy using minimally invasive approach. Four patients had a diagnosis of phaeochromocytoma; of whom 3 underwent LA and 1 underwent RA. The main steps of our current surgical technique for RA are described in the video lecture: patient positioning, port placement, and robot docking; exposure of the adrenal gland; identification and control of the adrenal vein; circumferential dissection of the adrenal gland; and specimen retrieval and closure. Demographic parameters and main surgical outcomes were assessed.
Results: In both groups, skin-to-skin operative time, estimated blood loss less, and intra-operative hemodynamic parameters were similar. There was no conversion to open. There was no morbidity or mortality in either group. Operation time was longer by 20 min in the RA, primarily related to docking of the robot. Blood loss and length of stay were similar.
Conclusions: To our knowledge, this is the first Irish experience comparing robotic versus laparoscopic resection of phaeochromocytoma. Our results show that the robotic approach is similar to the laparoscopic regarding safety and efficacy. The standardization of each surgical step optimizes the RA procedure.