

tumor with tumor free margins. The procedure is feasible robotically and if combined with intracorporeal urinary diversion, the overall morbidity and hospitalization can be decreased considerably. Since follow-up of our patient is 10 months, it is too early to discuss survival. Nevertheless, the patient is disease free after 10 months. There were no complications in our case.

Conclusion Robot assisted anterior pelvicotomy with anterior vaginal wall preservation is a feasible and mini-invasive technique. Our results have demonstrated the feasibility and oncological safety of performing anterior exenteration robotically in advanced pelvic cancer patients with acceptable morbidity.

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HIGH VISCERAL FAT PERCENTAGE IS LINKED TO UPREGULATED INFLAMMATORY TUMOUR SIGNALLING AND PREDICTS POOR OUTCOME IN UTERINE CERVICAL CANCER

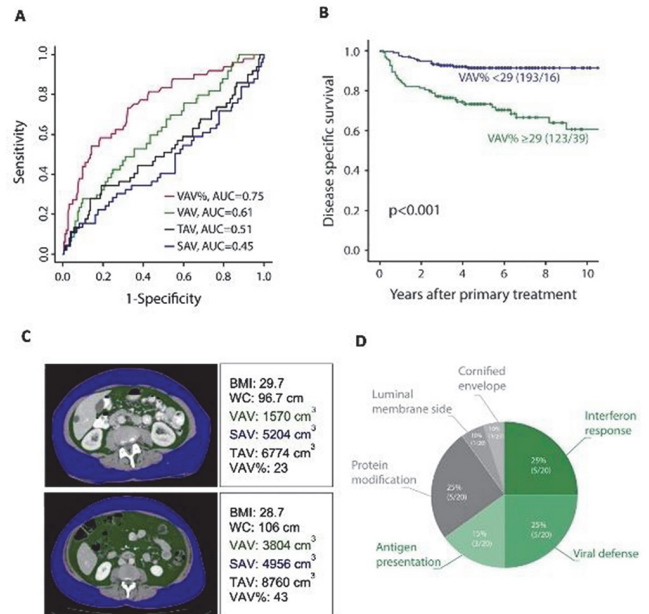
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Introduction/Background The aim of this study was to explore abdominal fat distribution markers from computed tomography (CT) in relation to clinicopathologic characteristics and patient outcome in uterine cervical cancer (CC). By unravelling possible links between fat distribution profiles and altered tumour signalling pathways, potential molecular targets for treatment based on body composition profiles may be identified, which may enable more individualized treatment strategies in CC.

Methodology The study included 316 CC patients diagnosed during 2004–2017 who had pre-treatment abdominal CT scans. CT images were analysed to quantify total abdominal fat volume (TAV), subcutaneous abdominal fat volume (SAV), visceral abdominal fat volume (VAV), visceral fat percentage (VAV% = VAV/TAV x100), liver density (LD) and waist circumference (WC). CT morphometric markers were explored in relation to clinicopathologic characteristics and disease-specific survival (DSS), and to gene expression profiles (L1000 mRNA) in a subset of 108 patients.

Results High TAV, VAV and VAV% and low LD were all associated with high (≥44 years) patient age (p≤0.017) and high International Federation of Gynaecology and Obstetrics (FIGO) (2018) stage (p≤0.01). High VAV% was the only CT marker predicting high-grade histology (p=0.028), large tumour size (p=0.016) and poor DSS (HR 1.06, p<0.001). VAV% was strongly positively correlated with age (r=0.68, p<0.001) and VAV (r=0.65, p<0.001). Patients with high VAV% had CC tumours with enrichment of gene sets (false discovery rate [FDR] <5%) related to inflammatory signalling with 65% (13/20) of the top ranked Gene Ontology gene sets related to interferon signalling, viral- or immune response.



Abstract 2022-RA-1383-ESGO Figure 1 High visceral fat percentage is linked to upregulated inflammatory tumour signalling and predicts poor outcome in uterine cervical cancer. (A) Time-dependent receiver operating characteristic (tdROC) curves for predicting disease-specific survival (DSS) at 5 years after diagnosis based on visceral abdominal fat percentage (VAV%), visceral abdominal fat volume (VAV), total abdominal fat volume (TAV) and subcutaneous abdominal fat volume (SAV). VAV% yielded significantly higher AUC (0.75) than the other morphometric makers (P<0.001 for all). (B) Kaplan-Meier plot depicting significantly reduced DSS in patients with VAV%≥29 compared with patients with VAV%<29 (p<0.001). (C) Abdominal compared tomography (CT) scans with segmentation of visceral and subcutaneous fat compartments carcinoma, international federation of gynaecology and obstetrics (FIGO) (2018) stage III. Patient I, aged 61 yrs, who had low VAV% (23%) received primary radiation therapy and subsequent chemotherapy with cisplatin. She developed pelvic metastases and died from cervical cancer 14 months after primary treatment. (D) Gene set enrichment analysis (GSEA) revealed that patients with VAV%>29 had tumours exhibiting upregulated signalling pathways for gene sets involved in inflammatory signalling and immune response (shown in green)

Conclusion High VAV% is associated with high-risk clinical features and predicts reduced disease-specific survival in CC patients. CC patients with high VAV% have tumours with upregulated genes involved in inflammatory signalling, suggesting that the metabolic environment induced by visceral adiposity influences the regulatory signalling pathways relevant for tumour progression in CC.

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TOTAL LAPAROSCOPIC RADICAL HYSTERECTOMY VERSUS LAPAROSCOPIC-ASSISTED VAGINAL RADICAL HYSTERECTOMY FOR THE TREATMENT OF EARLY-STAGE CERVICAL CANCER

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