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# The Prognostic Significance of the Depth of Cervical Stromal Invasion in Women with FIGO Stage II Uterine Endometrioid Carcinoma

S. A. R Alkhatib

Aseem Bhatnagar

N. Elshaikh

Charlotte Burmeister

Ghassan Allo

See next page for additional authors

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### **Authors**

S. A. R Alkhatib, Aseem Bhatnagar, N. Elshaikh, Charlotte Burmeister, Ghassan Allo, and Mohamed A. Elshaikh

patients (9.1%) experienced a grade 3 (G3) toxicity: 1 dermatitis and 1 fistula. Grade 2 (G2) acute toxicities include: 5% cystitis, 36% proctitis, 5% vaginal stenosis, 14% dermatitis/mucositis, 14% vaginal pain and 23% nausea. G2 late toxicities include: 5% cystitis, 5% proctitis and 5% vaginal pain. At mean follow up of 26.5 months, 40.9% of patients were deceased. 11 patients (50%) experienced disease recurrence/progression, most commonly outside of the RT field (63.6%). Four patients (18.2%) experienced local progression/recurrence. Median time to recurrence/progression was 18.0 months (95% CI 0-49.5). Median OS was 45.0 months (95% CI 15.4-74.6).

**Conclusion:** Escalated doses of RT for patients with FIGO IVB GM has tolerable acute and late toxicities while providing meaningful locoregional control. This warrants additional investigation into this treatment regimen.

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#### 2600

#### The Prognostic Significance of the Depth of Cervical Stromal Invasion in Women with FIGO Stage II Uterine Endometrioid Carcinoma

S.A.R. Alkhatib, A. Bhatnagar, N. Elshaikh, C. Burmeister, G. Allo, and M.A. Elshaikh; Department of Radiation Oncology, Henry Ford Cancer Institute, Detroit, MI, Department of Radiation Oncology, Henry Ford Cancer Institute, Detroit, MI, Henry Ford Hospital, Detroit, MI, Henry Ford Health System, Detroit, MI, Department of Pathology, Henry Ford Cancer Institute, Detroit, MI

**Purpose/Objective(s):** To explore the prognostic significance of the depth of cervical stromal invasion (CSI) on survival endpoints in women with FIGO stage II uterine endometrioid adenocarcinoma.

**Materials/Methods:** A total of 117 patients were included in this retrospective review. Between 1990 and 2021, all patients with FIGO stage II endometrial cancer (EC) underwent hysterectomy and oophorectomy at our institution, with or without lymph node dissection. Patients with synchronous ovarian or breast cancer, as well as those who had undergone adjuvant systemic chemotherapy for EC, were excluded from the study. Pathologic slides were retrieved for these patients and were reviewed by a gynecologic pathologist to determine stromal thickness and the depth of CSI. The depth of CSI was then measured as a percentage of invasion (% CSI) and used in the analysis as a continuous or dichotomous variable (<50% vs > =50%). Patients' demographics, pathologic, and treatment characteristics were analyzed using univariate and multivariate analysis to calculate recurrence-free (RFS) and disease-specific (DSS) rates.

**Results:** The median age for the study cohort was 65 years (range, 34–96), and the median follow-up was 131 months (range, 9–334). A total of 90 patients (77%) had lymph node dissection, with a median of 8 examined lymph nodes (range 0-18). Adjuvant radiation therapy (RT) with pelvic or vaginal cuff HDR brachytherapy, or a combination of the two, was completed in 92 patients (79 percent). The median % CSI was 27% (range, 1-100) with 68% of patients having  $\geq$  50% CSI. While there was a trend for a worse 5-year RFS and DSS for women with  $\geq$  50% CSI (69% vs. 83%, p = 0.093) and (78% vs. 91%, p = 0.034), respectively, the depth of CSI was not statistically significant as an independent predictor of 5-year RFS, DSS, or OS. The depth of CSI was not associated with a difference in the recurrence pattern (vaginal cuff, pelvic, paraaortic, or distant). In multivariate analysis, FIGO grade was the only predictor of 5-year OS. FIGO grade and the presence of lympho-vascular space invasion (LVSI) were independent predictors of 5-year RFS and DSS.

**Conclusion:** Deep cervical stromal invasion does not appear to be an independent predictive factor for survival endpoints in women with stage II uterine endometroid cancer, according to our findings. The presence of LVSI and tumor grade were both independent predictors of recurrence-

free and disease-specific survival. Pooled data analysis may be needed to validate our study findings.

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#### 2601

# Early-Stage Endometrial Ca with Multifocal LVSI - Adjuvant Radiation Treatment Choice

<u>A. AlQaderi</u>, <sup>1</sup> H. Chen, <sup>2</sup> A. Taggar, <sup>2</sup> E.W. Leung, <sup>3</sup> and E. Barnes<sup>3</sup>; <sup>1</sup>University of Toronto, Toronto, ON, Canada, <sup>2</sup>Department of Radiation Oncology, Odette Cancer Centre, Sunnybrook Health Sciences Centre, University of Toronto, Toronto, ON, Canada, <sup>3</sup>Department of Radiation Oncology, Sunnybrook Health Sciences Centre, Odette Cancer Centre, University of Toronto, Toronto, ON, Canada

**Purpose/Objective(s):** The aim of this study is to determine if adjuvant pelvic radiation treatment (RT) decreases the risk of locoregional recurrence in patients with early-stage uterine cancer with substantial lymphovascular invasion (LVSI) compared with vaginal vault brachytherapy (VVB) alone.

Materials/Methods: Retrospective review identified International Federation of Gynecology and Obstetrics (FIGO) Stage I-II endometrial cancer patients receiving pelvic RT from 2010-2018. Extent of LVSI was reported as none, focal, or substantial. Outcomes included recurrence rate and pattern, and overall survival (OS). Kaplan-Meier estimates and Log-Rank test were used to determine significance between variables. Cox proportional hazards model was used for multivariate analyses. VVB data from a prior published retrospective analysis from our center was used for comparison of outcomes using propensity score-matched analysis.

Results: 231 patients were identified with a median follow-up of 49 months. LVSI was found in 148 patients with extent reported in 116, 31 had focal and 85 substantial LVSI. Estimated OS at 48 months is 79 (74-85%). 4% of patients had recurrence locoregionally while 6% had distant metastases. In comparison with VVB cohort, where substantial LVSI was an independent risk factor for pelvic recurrence, substantial LVSI was not associated with pelvic recurrences in this external beam RT cohort. There was, however, a trend of an increase in distant metastases with substantial LVSI [HR 1.61; 95% CI 0.83-3.12], mostly noted after 12 months of treatment, albeit not statistically significant [p=0.16].

**Conclusion:** Given that substantial LVSI was associated with significant pelvic failure in VVB group but not with the pelvic RT cohort, we can hypothesize that pelvic RT in early-stage endometrial cancer with substantial LVSI can decrease locoregional recurrences, but not distant failure.

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#### 2602

# Locoregional Control Following Adjuvant Chemotherapy and Radiotherapy for Treatment of High-Risk Endometrial

E. Babadagli, <sup>1,2</sup> A. Kulkarni, <sup>1,3</sup> T. Le, <sup>1,3</sup> M. Fung-Kee-Fung, <sup>1,3</sup> K. Lupe, <sup>1,2</sup> M. Gaudet, <sup>1,2</sup> C. E, <sup>1,2</sup> and R. Samant <sup>1,2</sup>; <sup>1</sup>The Ottawa Hospital Cancer Centre, Ottawa, ON, Canada, <sup>2</sup>Division of Radiation Oncology, University of Ottawa, Ottawa, ON, Canada, <sup>3</sup>Division of Gynecologic Oncology, University of Ottawa, Ottawa, ON, Canada

**Purpose/Objective(s):** Patients with locally advanced stage and aggressive histology endometrial cancer are at high risk of relapse, and usually treatment includes surgery, chemotherapy and radiotherapy. The timing and coordination