Methodology This is a prospective, multicentric, observational study, women with early-stage EC underwent surgical staging with SNL identification. SNLs were serially sectioned at 2 mm slices thickness perpendicular to the longest axis of the node, the odd slices were submitted to ultra-staging, according to our institutional ultrastaging protocol, even slices were submitted to the OSNA analysis.

Results This is the largest study, until now, with three-hundred-and-sixteen patients enrolled with 668 SNLs analyzed with the two methods OSNA and US. OSNA assay detected 22 (3,3%) positive SNLs of which 17 (2,5%) micrometastases, and 5 (0,7%) macrometastases, whereas pathological ultrastaging detected 24 (3,6%) positive SNLs of which 15 (2,2%) micrometastases and 9 (1,3%) of macrometastases. In addition, OSNA detected 649 negative nodes (including 8 ITC), while Ultrastaging 644 negative nodes (with 26 ITC.) Using Ultrastaging as a reference method the specificity of 98,4%, the diagnostic accuracy of 96,7%, and the negative predictive value of 98,1% were attended. Discordant results were found in 22 SNLs (3,2%) corresponding to 20 patients (6,3%). We found 10 false-positive SNLs, all micrometastases, and 12 false-negative lymph nodes of which 9 micrometastases and 3 macrometastases.

Conclusion Although only portions of a whole lymph node have been examined with OSNA analysis, it has proved to be highly specific with high diagnostic accuracy, a high negative predictive value, and moderate concordance with the standard US. Therefore, we believe that OSNA is a valid method for analyzing lymph node metastases in patients with apparent early-stage EC, which allows us to analyze the entire lymph node with a standardized method.

2022-RA-995-ESGO INDEPENDENT PROGNOSTIC SIGNIFICANCE OF SUBSTANTIAL LYMPHOVASCULAR SPACE INVASION (LVSI) IN A CONSECUTIVE SERIES OF PRIMARY LVSI-POSITIVE ENDOMETRIAL CARCINOMA (EC)

[1]Stefan Kommoss, [1]Charlotte Meyer, [1]Marcel Grube, [1]Teresa Praetorius, [1]Sara Y Brucker, [1]Felix Neiss, [1]Bernhard Krämer, [1]Christina Barbara Walter, [2]Friedrich Kommoss, [3]Annette Staebler, [4]Blake Gilks, [4]Naveena Singh. *[1]Department of Women`s Health, Tübingen University Hospital, Tübingen, Germany; [2]Institute of Pathology, Im Medizin Campus Bodensee, Friedrichshafen, Germany; [3]Institute of Pathology, Tübingen University Hospital, Tübingen, Germany; [4]Department of Pathology and Laboratory Medicine, University of British Columbia, Vancouver, BC, Canada*

10.1136/ijgc-2022-ESGO.272

Introduction/Background LVSI is known to be associated with unfavorable outcome in EC. Recent studies have shown that the extent of LVSI is one of the strongest prognosticators of local as well as distant recurrence after primary therapy. Therefore current risk-assessment algorithms, such as the ESGO-ESTRO-ESP consensus guidelines, require classification of LVSI as 'substantial' versus 'focal or negative' LVSI. It was the aim of this study to investigate the impact of LVSI quantification in a consecutive series of EC in which LVSI was found to be positive after routine pathology assessment.

Methodology EC patients treated at the Tuebingen University Women's Hospital between 2003 and 2016 were identified. Cases in which LVSI had been reported after routine pathology were independently reviewed by three experienced gynecopathologists according to current clinical practice (review of all tumor-containing H&E stained hysterectomy slides). The final LVSI classification was reached by a majority vote of the expert panel. DNA-sequencing for pathogenic POLE mutations and p53/MMR immunohistochemistry was performed on all cases.

Results After chart review of 770 cases, n=95 LVSI-positive cases were available for further research. LVSI was found to be substantial in 50/95(53%) cases. 5-yr disease-specific survival was 42% in cases with substantial LVSI and 74% in LVSI focal/negative cases. No prognostic impact was observed for molecular classification in this highly selected cohort. While established clinicopathological parameters were shown to be of prognostic significance in univariate analyses, LVSI quantification was shown to be the only independent prognosticator after multivariate analyses (HR 2,24;p=0,04).

Conclusion Our results support further LVSI quantification in EC found to be LVSI-positive upon routine pathology assessment. Patients with substantial LVSI are at high risk for relapse and fatal outcome. LVSI quantification may help to guide adjuvant treatment and might be of key importance for the development of new personalized EC treatment strategies.

2022-RA-997-ESGO LUNG RECURRENCE OF ENDOMETRIAL ADENOCARCINOMA: IMPACT OF MOLECULAR PROFILE AND ROLE OF LOCAL THERAPIES ON PROGNOSIS

[1]Ana Luzarraga, [1]Vicente Bebia, [2]Carlos Lopez-Gil, [3]Maria Pilar Montoya, [4]Alexandra Giraldo, [3]Alberto Jauregui, [4]Ramona Verges, [5]Josep Castellvi, [5]Angel Garcia-Jimenez, [2]Eva Colas, [6]Antonio Gil, [6]Silvia Cabrera. *[1]Gynecologic Oncology, Hospital Vall d'Hebron, Barcelona, Spain; [2]Vall d'Hebron Research Institute (VHIR), Barcelona, Spain; [3]Thoracic surgery, Hospital vall Hebron, Barcelona, Spain; [4]Radiation Oncology, Hospital vall Hebron, Barcelona, Spain; [5]Anatomy, Hospital vall Hebron, Barcelona, Spain; [6]Vall Hebron Hospital, Barcelona, Spain*

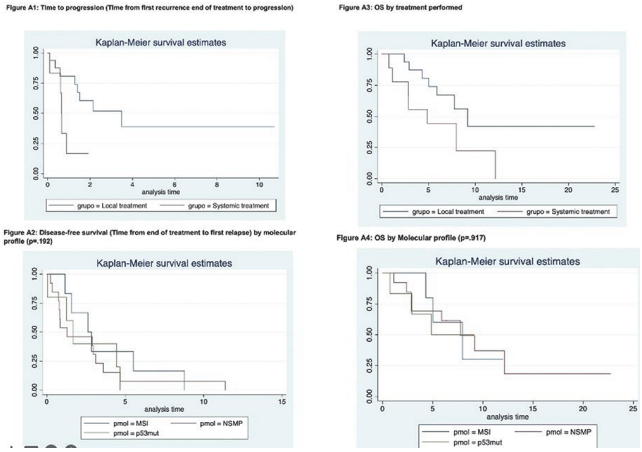
10.1136/ijgc-2022-ESGO.273

Introduction/Background Endometrial cancer(EC) lung recurrence can be classified as multiple-site recurrence (affecting the lung and other organs) or isolated lung recurrence (affecting only the lung). Isolated lung recurrent patients may have the potential for long-term disease control and improved prognosis with local treatments: stereotactic body radiation therapy (SBRT) or metastasectomy.

Methodology This is a retrospective single-center study including consecutive women diagnosed with stage I-IVA EC at the Hospital Vall d'Hebron between 1995 and 2021 with first recurrence affecting the lung. Patients were classified as multiple-site metastatic or isolated lung recurrence, and these last according to the treatment received (local or systemic). We aimed to analyze local response rate and prognostic outcomes according to received treatment and the molecular classification (MC).

Results Isolated lung systemic-treated patients (n=15) were older (77 vs 69.7 years-old at relapse,p=0.43) and had more often bilateral (73.3%vs37.5%, p=0.008) and a higher number of metastases (p=0,001) than locally-treated patients (n=16). Of the locally-treated group, 5 were treated with

SBRT and 11 with surgery. Complete response was achieved in 80% and 90.9%, respectively. 9(56%) vs 1(11,1%) patients were alive and without disease at the end of follow-up (median follow-up: 5.9 years) in local and systemic treatment groups, respectively(p=0,05)(Image2). Median-time-to-progression was higher in local-treatment group (3,5 ys vs 0,7 ys, p=0.029), as well as 5-year-OS (80,8% vs 44,4%, p=0.88). No statistically significant differences were found between multiple-site metastasic patients and isolated lung recurrent patients regarding molecular profiling:21.9% were MSI, 34.4% NSMP, 21.9% p53-abn and 0% POLEmut (p=0,537). Disease-free-survival (DFS) by molecular classification was similar between isolated lung recurrent patients after their treatment (figure 1).



Abstract 2022-RA-997-ESGO Figure 1

Abstract 2022-RA-997-ESGO Table 1

Table A1. Demographic and primary tumor features.

Variable [n (%) or median (IQR)]		Local treatment (n=16)	Systemic treatment (n=15)	Total (n=31)	p value
Demographics, primary tumor features					
Age at surgery		66.0 (63.0-71.8)	72.7 (63.2-78.2)	68.3 (63.0-77.6)	.236*
BMI		29.5 (25.3-37.3)	30.4 (23.5-39.5)	29.8 (25.4-37.3)	.973*
FIGO stage					
	IA	3 (18.8)	0 (0.0)	3 (9.7)	.430*
	IB	5 (31.3)	5 (33.3)	10 (32.3)	
	II	5 (31.3)	5 (33.3)	10 (32.3)	
	IIIA	1 (6.3)	1 (6.7)	2 (6.5)	
	IIIB	1 (6.3)	0 (0.0)	1 (3.2)	
	IIIC2	1(6.3)	3 (20.0)	4 (12.9)	
	Unknown	0 (0.0)	1 (6.7)	1 (3.2)	
Histology					
	Endometrioid	12 (75.0)	8 (53.3)	20 (64.5)	.549*
	Serous	4 (25.0)	5 (33.3)	9 (29.0)	
	Carcinosarcoma	0 (0.0)	1 (6.7)	1 (3.2)	
	Unknown	0 (0.0)	1 (6.7)	1 (3.2)	
Molecular profile					
	MSI	5 (31.3)	2 (13.3)	7 (22.6)	.555*
	NSMP	8 (50.0)	7 (46.7)	15 (48.4)	
	p53mut	3 (18.8)	5 (33.3)	8 (25.8)	
	Unknown	0 (0.0)	1 (6.7)	1 (3.2)	
Tumor grade					
	G2	5 (31.3)	4 (26.7)	9 (29.0)	1*
	G3	11 (68.8)	11 (73.3)	22 (71.0)	
LVSI positivity		8 (50.0)	10 (66.7)	18 (58.1)	.347#
Myometrial invasion					
	<50%	3 (18.8)	1 (6.7)	4 (12.9)	.600*
	>=50%	13 (81.3)	14 (93.3)	27 (87.1)	

Table A2: Recurrence features and survival*

Variable		Local treatment (n=16)	Systemic treatment (n=15)	Total (n=31)	p value
Age at relapse		69.7 (66.3-74.1)	77.0 (64.5-80.5)	71.4 (65.1-78.8)	.429*
Affected lung					
	Left	6 (37.5)	0 (0.0)	6 (19.4)	.008*
	Right	4 (25.0)	1 (6.7)	5 (16.1)	
	Both	6 (37.5)	11 (73.3)	17 (54.8)	
	Unknown	0 (0.0)	3 (20.0)	3 (9.7)	
Lobe affected					
	SRL	3 (18.8)	1 (6.7)	4 (12.9)	.141*
	IRL	1 (6.3)	0 (0.0)	1 (3.2)	
	SLL	1 (18.8)	1 (6.7)	4 (12.9)	
	ILL	3 (18.8)	0 (0.0)	3 (9.7)	
	Multiple	6 (37.5)	10 (66.7)	16 (51.6)	
	Unknown	3 (0.0)	3 (20.0)	3 (9.7)	
Maximum diameter of lung metastasis		12 (7.5-16)	16.5 (10.5-22)	12.5 (8.25-21)	.162*
Number of lung metastasis					
	1	10 (62.5)	0 (0.0)	10 (32.3)	<.001*
	2	3 (18.8)	3 (20.0)	6 (19.4)	
	3	2 (12.5)	1 (6.7)	3 (9.7)	
	4	1 (6.3)	1 (6.7)	2 (6.5)	
	More tan 5	0 (0.0)	7 (46.7)	7 (26.0)	
	Unknown	0 (0.0)	3 (20.0)	3 (9.7)	

Table A2. Survival features and follow-up

Variable		Local treatment (n=16)	Systemic treatment (n=9)	Total (n=25)	p value
Subsequent relapse or progression					
	Relapse	6 (37.5)	0 (0.0)	6 (24.0)	<.001*
	Disease progression	2 (12.5)	8 (88.9)	10 (40.0)	
	No	8 (50.0)	1 (11.1)	9 (36.0)	
Location of second relapse or progression					
	Lung	6 (75.0)	4 (50.0)	10 (62.5)	.608*
	Other	2 (25.0)	4 (50.0)	6 (37.5)	
Treatment of second relapse					
	SBRT	1 (12.5)	0 (0.0)	1 (6.3)	.331*
	Hormonotherapy	4 (50.0)	3 (37.5)	7 (43.8)	
	Chemotherapy	3 (37.5)	2 (25.0)	5 (31.3)	
	Palliative	0 (0.0)	3 (37.5)	3 (18.8)	
Median follow up (yr)		6.4 (4.7-9.1)	4.9 (2.8-5.9)	5.9 (3.9-8.0)	.090*
Five years OS (% alive)		80.8 (51.4-93.4)	44.4 (13.6-71.9)	67.6 (45.4-82.3)	.088$
Median time to progression (yr)		3.5 (1.3-NA)	0.7 (0.6-0.9)	1.5 (0.7-NA)	.029$
Patient status at last follow up					
	Alive without disease	9 (56.3)	1 (11.1)	10 (40.0)	.050*
	Alive with disease	0 (0.0)	1 (11.1)	1 (4.0)	
	Dead	7 (43.8)	7 (77.8)	14 (56.0)	
Cause of death					
	Endometrial cancer	7	7	11	NA

*Patients submitted to palliative treatment were excluded from this analysis.
*Mann Whitney U # Chi squared test ^ Fisher exact test

Conclusion Isolated lung recurrent patients locally-treated had the best DFS, OS, and a higher median-time-to-progression. Among tumors recurring in the lung, NSMP was the most frequent group. DFS was similar after lung recurrence treatment regarding molecular profile in the oligometastatic cohort.

2022-RA-998-ESGO

INTERMEDIATE-RISK ENDOMETRIAL CANCER: ISOLATED TUMOR CELLS (ITC) *VERSUS* NODE-NEGATIVE IN SENTINEL LYMPH NODE MAPPING. AN INTERNATIONAL MULTI-INSTITUTIONAL COMPARATIVE STUDY

[1,2]Giuseppe Cucinella, [1,3]Gabriella Schivardi, [4]Xun Clare Zhou, [5]Mariam Alhilli, [6]Sumer Wallace, [7,8]Christoph Wohlmuth, [9]Glauco Baiocchi, [10]Nedim Tokgozoglu, [11]Francesco Raspagliesi, [12,13]Alessandro Buda, [3]Vanna Zanagnolo, [14]Ignacio Zapardiel, [15]Nisha Jagasia, [16]Robert Giuntoli II, [17]Ariel Glickman, [18]Michele Peiretti, [19]Maximillian Lanner, [20]Enrique Chacon, [21]Julian Di Guilmi, [22]Augusto Pereira, [23]Enora Laas, [24]Ami Fishman, [25]Caroline C. Nitschmann, [26]Katherine Kurnit, [4]Kristen Moriarty,[27,5]Amy Joehlin-Price, [6]Brittany Lees, [7]Allan Covens, [9]Louise de Brot, [10,28]Cagatay Taskiran, [11]Giorgio Bogani, [29]Tommaso Grassi, [29]Cristiana Paniga, [1,3]Francesco Multinu, [14]Alicia Hernandez-Gutierrez, [16]Spyridon Mastroyannis, [2]Vito Chiantera, [30]Amy L. Weaver, [30]Michaela E. McGree, [1]Andrea Mariani, [1]Gretchen Glaser. *[1]Department of Obstetrics and Gynecology, Mayo Clinic, Rochester, MN; [2]Department of Gynecologic Oncology, University of Palermo, Palermo, Italy; [3]IEO, European Institute of Oncology IRCCS, Milan, Italy; [4]Hartford HealthCare, Hartford, CT; [5]Cleveland Clinic, Cleveland, OH; [6]University of Wisconsin School of Medicine and Public Health, Madison, WI; [7]Sunnybrook Health Sciences, University of Toronto, Toronto, ON, Canada; [8]Department of Obstetrics and Gynecology, Paracelsus Medical University, Salzburg, Austria; [9]A.C. Camargo Cancer Center, Sao Paulo, Brazil; [10]Turkish Society of Gynecologic Oncology, Istanbul, Turkey; [11]Fondazione IRCCS Istituto Nazionale Tumori -Milan, Milan, Italy; [12]University of Milano-Bicocca, Monza, Italy; [13]Ferrero Hospital, Verduno, Italy; [14]La Paz University Hospital-IdiPAZ, Madrid, Spain; [15]Mater Hospital Brisbane & Mater Research Institute, University of Queensland, Brisbane, Australia; [16]University of Pennsylvania Health System, Philadelphia, PA; [17]Barcelona Clinic Hospital, Barcelona, Spain; [18]University of Cagliari, Cagliari, Italy; [19]Department of Gynaecology, Medical University of Graz, Graz, Austria; [20]Clínica Universidad de Navarra, Madrid, Spain; [21]Hospital Britanico de Buenos Aires, Buenos Aires, Argentina; [22]Hospital Universitario Puerta de Hierro-Majadahonda, Madrid, Spain; [23]Curie Institute, Paris, France; [24]Meir Medical Center, Faculty of Medicine, Tel-Aviv University, Israel; [25]Lahey Clinic, Burlington, MA; [26]University of Chicago, Chicago, IL; [27]Obstetrics and Gynecology Residency Program, University of Connecticut, CT; [28]Department of Gynecologic Oncology, Koc University School of Medicine, Istanbul, Turkey; [29]San Gerardo Hospital, University of Milano-Bicocca, Monza, Italy; [30]Department of Quantitative Health Sciences, Mayo Clinic, Rochester, MN*

10.1136/ijgc-2022-ESGO.274

Introduction/Background The clinical impact of isolated tumor cells (ITC) (≤0.2 mm) in sentinel lymph nodes (SLN) of endometrial cancer (EC) is unclear. This study compared the recurrence-free survival (RFS) of intermediate-risk EC patients who underwent SLN biopsy and were node-negative vs. those who had ITC.

Methodology Patients with SLN-ITC, between 2012 and 2019, were identified from 21 centers worldwide, while SLN-node-negative patients were identified from Mayo Clinic, Rochester, between 2013 and 2018 and served as comparing group. Only patients with uterine-confined EC and intermediate-risk factors [grade 1 or 2 endometrioid and myometrial invasion (MI) ≥50%; grade 3 endometrioid and MI <50%; non-endometrioid without MI] were included. Adjuvant therapy (ATx) included vaginal brachytherapy (VB), external beam radiation and/or chemotherapy (EBRT±CHT). The primary outcome was non-vaginal recurrence (hematogenous, peritoneal or lymphatic).

Results Of 200 patients included, 74 had ITC and 126 were node-negative. Sixteen patients had a non-vaginal recurrence and the median follow-up for patients without recurrence was 2.9 (IQR, 1.8–3.8) and 2.8 (0.8–4.4) years for the two groups, respectively. Among the 162 patients with ATx (VB