Introduction/Background Complete cytoreduction is the most critical prognosticator for survival in ovarian cancer patients. Prediction of suboptimal cytoreduction surgery for advanced ovarian cancer can prevent unnecessary surgery and morbidity. Therefore, the present study compared the R0 rates of patients with advanced stage ovarian cancer in two different settings, one having multidisciplinary team hospital and one without a multidisciplinary team hospital.

Methodology Retrospective cohort study of patients with advanced ovarian cancer who underwent upfront debulking surgery in two settings (n=225). Surgery for advanced stage ovarian cancer may include splenectomy, colon resection, hepatic resection, diaphragmatic stripping, peritoneectomy, cholecystectomy, total colectomy, parcial colectomy, primary anastomosis, small intestine resection, ilioanal anastomosis, j poche application, liver resection, choleslysectomy, diaphragmatic stripping, and implant resection. The rate of complete cytoreduction in the multidisciplinary team hospital was compared with the rates in the non-multidisciplinary team hospital.

Results The results of the study showed that multidisciplinary team hospitals had a significantly higher rate of complete cytoreduction than non-multidisciplinary team hospitals. R0 rates were 87% vs 45% (p<0.05).

Conclusion Preoperative evaluation to decide resectability of the advanced stage ovarian cancer is not always reliable. Our results supported that multidisciplinary team competence and experience of physicians were more predictive of complete cytoreductive surgery.

Disclosures The authors have no potetial conflict of interest to report.

#745 OVARIAN TUMORS AND PREGNANCY: ABOUT 18 CASES
Merieme Alami Merrouni*, Marwa Marwa Sekkat Chu. Fez, Morocco
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Introduction/Background The association of ovarian tumors and gravidiperitoneal state corresponds to any proliferative process developed at the ovarian level during pregnancy.

Methodology The objective of our study is to review this association through the study of cases collected in the department of obstetrics gynecology I at the university hospital Hassan II of Fez during the period January 2017/2023.

Results The age of our patients varies between 20–43 years with an average age of 32 years. 5 of our patients were on oral contraception. None of our patients had a family history of ovarian cancer or Lynch syndrome.

The diagnosis of ovarian tumor was made at different ages of pregnancy with an average of 17 years. The majority of our patients (11 cases) reported acute onset abdominal-pelvic or pelvic pain. Three of our patients presented with metrorrhagia.

Twelve patients underwent laparotomy during their pregnancy, six of them during the first trimester of pregnancy. The surgical procedure was a cystectomy in three cases, oophorectomy in seven cases, adnexectomy in one case, and extended surgery in one case (total hysterectomy with bilateral adnexectomy).

Conclusion Expectantation is recommended for ovarian tumors presumed to be benign and not progressing during pregnancy. The risk of miscarriage following surgery (laparoscopy and laparotomy) for ovarian tumor during pregnancy is estimated at 2.8%. The modalities of delivery should not be modified by the ovarian tumor, except in case of obstacle praevia, complication or suspicion of malignancy.

Disclosures The frequency of ovarian tumors discovered during pregnancy is between 0.3 and 5.4%. The most common benign organic ovarian tumors in pregnancy are dermoid cysts followed by cystadenomas. The main complication risk of ovarian tumors during pregnancy is adnexal torsion.

Tumor markers are not reliable during pregnancy. Ultrasound remains the reference examination to characterize an ovarian tumor during pregnancy. Its specificity is lower for the diagnosis of malignancy than outside pregnancy. Pelvic MRI is an efficient examination for the diagnosis of ovarian tumours during pregnancy and provides additional information to ultrasound.

#746 MOLECULAR ANALYSIS OF BRCA AND HRD STATUS FROM SMALL BIOPSIES IN HIGH GRADE SEROUS CARCINOMA. A REAL-WORLD COMPARATIVE ANALYSIS
1Paul Kubelac*, 1Anca Avram, 1Adrian Tucac, 1Andrei Roman, 1Andra Picio, 1Andrei Pasca, 1Vlad Gata, 1Irina Trpca, 1 Bogdan Pop, 1Ovidiu Balacescu, 1Catalin Vlad, 1Patricia Achimas-Cadariu. 1Institute of Oncology, Cluj Napoca, Romania; 2University of Medicine and Pharmacy, Cluj Napoca, Romania; 3Institute of Oncology, Chisinau, Moldova
10.1136/ijgc-2023-ESGO.640

Introduction/Background Treatment in high-grade serous ovarian cancer (HGSOC) depends upon knowledge of BRCA and homologous recombination deficiency (HRD) status. Hence, tumor quality is critical for successful genomic analyses. We investigated if samples from ultrasound-guided biopsies (UGB) could yield conclusive results compared to surgical excision specimens (SES).

Methodology A retrospective analysis of HGSOC confirmed through UBG was done. Paired temporal cases from SES were selected. BRCA and HRD analysis was done with Ion GeneStudioTM S5 Prime System using the Oncomine BRCA assay and Oncoscan CNV array (Thermo Fisher Scientific).

Results 78 patients diagnosed with HGSOC between 2021–2023 were included. 113 genomic analyses were performed (32 sBRCA and 10 HRD from UBG; 44 sBRCA and 27 HRD from SES). sBRCA analysis from UGB was successful in 65% of samples. Cases with successful results had a higher number of tumor samples (mean 5.5 vs. 4.9), higher total tumor length (mean 19.5 vs. 16.6 mm), higher DNA quality (mean 15.5 vs 1.5 ng/µl) and significantly lower number of IHC stains/series (mean 6.3 vs. 8.4, p=0.024; mean 1.2 vs. 1.8, p=0.06) in comparison with unsuccessful results. Adnexal and omental biopsies were significantly associated with a lower rate of conclusive results than other (cytoblock, colon, lymph node, peritoneal/pleural nodule) sites (50% vs 85%, p=0.034). In addition, UGB done on Friday had a lower rate of successful results than biopsies performed Monday–Thursday (42.8% vs. 69.5%). HRD analysis from UGB was successful in 60% of samples. sBRCA and HRD analysis from SES was successful in 88% and 96% of samples and there were no differences regarding the timing of surgery or NACT.

Conclusion Careful planning of UGB and stepwise tissue diagnosis with respect to influencing factors can increase the success rate of genomic analyses in HGSOC and could be a feasible alternative to SES.
RELATIONSHIP BETWEEN KELIM SCORE AND OUTCOME OF CYTOREDUCTION IN PATIENTS WITH EPITHELIAL OVARIAN CANCER UNDERGOING NEOADJUVANT CHEMOTHERAPY: AN ONE INSTITUTION EXPERIENCE

Kristina Katic*, Vlênia Matkovic, Jasko Lešin, Goran Vujic. University Hospital Centre Zagreb, Zagreb, Croatia

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Introduction/Background Neoadjuvant chemotherapy (NACT) followed by interval debulking surgery (IDS) is treatment option for patients with advanced epithelial ovarian cancer (EOC). The modulated CA-125 elimination rate constant K (KELIM) is marker of chemosensitivity, and no residual macroscopic disease after surgery is the most important predictive factor. Our aim was to investigate the relationship between KELIM score and cytoreduction outcome in EOC patients undergoing NACT.

Methodology Retrospectively, we have analysed the medical data of patients with EOC stage IIIB-IVB treated with NACT at the Department of Gynaecologic Oncology, the University Hospital Zagreb from January 2020 to June 2022. The KELIM score was calculated based on at least 3 CA-125 values. The patients are divided into two categories according to KELIM score: group 1 (KELIM score <1) and group 2 (KELIM score ≥1).

Results Our analysis included 65 patients: 30 (46%) patients in group 1 compared with 35 (54%) in group 2. The median age was 65 years in both groups. ECOG performance status 0–1 had 56.7% of patients in group 1 and 60% in group 2. The most commonly used chemotherapy protocol in both groups was paclitaxel/carboplatin. Three or four cycles of NACT was used in 40% of patients in group 1, compared with 35% in group 2 and the others received more than 4 cycles NACT. Bevacizumab was administered to 13 (43%) patients in group 1 and to 16 (46%) in group 2. Thirty-three (94%) of patients underwent surgery in the group with a KELIM score ≥1, compared with only 19 (63%) in group 1. Among patients with a KELIM score <1, only 23% underwent complete surgical procedure without residual disease, compared with 80% in group 2.

Conclusion Patients with advanced EOC undergoing NACT with KELIM <1 were more likely to have platinum-resistant disease and are less likely to achieve surgery without residual disease.

Disclosures The authors have declared no conflicts of interest.

IMPACT OF METFORMIN ON THE EFFICACY OF MAINTENANCE WITH PARPi IN PATIENTS WITH NEWLY DIAGNOSED OVARIAN CANCER

1Carolina Maria Sassu*, 2Chiara Del Prete, 3Raffaela Ergasti, 4Eleonora Palluzzi, 5Antonella De Palma, 6Carolina Bottoni, 7Giacomo Corrado, 8Olga Martelli, 9Domenica Lorusso, 10Giovanni Scambia, 11Anna Fagotti, 12Claudia Marchetti. 1Dipartimento Scienze della Salute della Donna, del Bambino e di Sanita’ Pubblica, Fondazione Policlinico Universitario Agostino Gemelli, IRCCS, Rome, Italy; 2Dipartimento Scienze della Vita e Sanita’ Pubblica, Universita’ Cattolica del Sacro Cuore, Rome, Italy

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Introduction/Background Literature evidence demonstrated that the combination of metformin with other drugs, such as Poly (ADP-Ribose) Polymerase inhibitor (PARPi), has strong cytotoxic effects in ovarian cancer (OC) cells. However, these data come from preclinical studies. Thus, it is crucial to evaluate the role of metformin during PARPi maintenance in OC patients in clinical practice.

Methodology Data of patients affected by newly diagnosed OC who received metformin during the maintenance with PARPi, treated at our center from 2018 to 2022 were collected (Met Group). These were compared with a historical series of patients without metformin taking due to the absence of glucose metabolic disorder, with clinical and pathological features comparable (No-Met Group).

Results 17 OC patients in contextual treatment with metformin and PARPi and 17 patients without metformin were identified and compared. The characteristics of patients and disease at diagnosis were homogeneous regardless of the metformin intake. The median age of OC diagnosis was 62 years. The most frequent histotype was high-grade serous (97.1%) with FIGO stage III (76.5%). The analyzed patient cohorts did not differ in terms of treatment: most of the patients underwent standard chemotherapy (Sweekly carboplatin and paclitaxel) (91.1%) and interval debulking surgery (64.7%) with no residual tumor (94.1%).

After a median follow-up of 21 months, recurrences were more frequent in No-Met Group (58.8%) compared with Met Group (35.3%) (p 0.15).

There was a trend of improvement in median Progression-Free Survival (PFS) in patients who took metformin compared with those who did not, although not statistically significant (Median PFS: Met Group Not Reached vs No-Met Group 21 months, p 0.32 figure 1).

Conclusion A trend of survival improvement in patients treated with PARPi and metformin was detected. Our results might be considered hypothesis-generating research, justifying wider and prospective studies.

Disclosures None