INTRODUCTION
Ovarian tumours are a heterogeneous group of neoplasms which account for one of the top five gynaecological malignancies in Indian women. The WHO classification of ovarian tumours is based on morphology with the recent molecular studies supporting the morphology based classification system. Ovarian neoplasms manifest at a late stage either stage 3 or 4 as the symptoms are delayed and non specific and even imaging modalities can be misleading and cytology has its own limitations, hence histopathology diagnosis remains the main stay in achieving an optimum treatment response.

MATERIAL AND METHODS
This is a two year retrospective study carried out between December 2017 to December 2019 in the Department of Pathology, Govt Medical College, Jammu. A total of 62 cases of ovarian tumours were studied. Non neoplastic lesions were excluded from the study. Gross examinations of the specimen along with clinical details were also taken into account for the final diagnosis given on H&E stained slides. All the ovarian tumours were classified based on WHO classification.

RESULTS:
Out of the total 62 ovarian tumours majority 47 (75.80%) were benign, 10 (16.10%) were malignant and 5 (8.10%) borderline. Age ranged from 13 to 70 years. Surface epithelial tumours (SET) were the commonest 39 (62.90%) followed by germ cell tumours 19 (30.65%). Benign serous cyst was the commonest ovarian tumour among the SET and mature cystic teratoma in the Germ cell tumours. In the malignant category Papillary serous cystadenocarcinoma was the commonest followed by mucinous cyst adenocarcinoma.

CONCLUSION:
A correct histomorphological diagnosis of ovarian tumours help gynaecologist in proper treatment of the patient and in institutes with limited provision of resources, histopathological study remains the gold standard.

KEYWORDS
ovarian tumours, serous, germ cell tumour, histopathology
DISCUSSION

Ovarian tumours form a complex group of neoplasms with varied histological features. The vast majority of these are benign and occur mostly in young women between the age of 20-45 years. In our study also, 75.80% of the tumours were benign, followed by malignant tumours 16.10%, and borderline 8.10%. Benign serous cyst and Mature cystic teratoma or Dermoid cyst being the commonest. This observation correlates with the studies of Singh S et al, Couto F et al, and Kuladeepa AVK et al.14

In the present study, age ranged from 13-70 years with the maximum cases seen in 31-40 years of age and this was supported by the study done by Swamy GG et al. Most common ovarian tumour in our study was Surface epithelial 62.90% followed by Germ cell Tumour 30.65%, Sexcord stromal tumour 4.84% and Metastatic 1.61% and this corresponds to study done by Garg N et al.15

Among the Surface epithelial tumours, Benign serous cyst was commonest followed by benign mucinous cyst. Among the malignant surface epithelial tumours, Papillary serous cyst adenocarcinoma was commonest seen in 4 cases and all above 50 years of age. In our study incidence of Papillary serous cyst adenocarcinoma was found to be 6.45% which is similar to the study done by Sharma I et al.16 There were 5 cases of borderline serous tumour and no case of borderline mucinous tumour. It is important to separate them from the obviously invasive tumours because of their vastly better prognosis. Our study showed 1 case of malignant Brenner tumour that constituted 1.61% of the total surface epithelial tumours. It was seen in a 50 years old female with large unilateral ovarian mass and on cut section contains both solid and cystic areas along with yellowish viscous fluid. Microscopically it showed definite stromal invasion along with cystic nests of transitional epithelium (urothelium with nuclear atypia)

In the present study, majority of Germ cell tumours were benign and include 18 cases of Mucinous cystic teratoma. These results were closer to the findings of Agarwal P et al.17 Malignant tumours include a single case of dysgerminoma seen in 20 years old young girl. In our study Sex cord stromal tumours were benign mostly this is in comparison with study of Badge SA et al.18

Our study showed 1 case of metastasis to ovary and constituted 1.61% of all ovarian tumours this was similar to the findings of Gupta N et al19, Jha R & Karki S.20 This occurred in a case of 50 years old female presenting with ascites and ovarian mass.

CONCLUSION

Ovarian tumours are silent killers presenting a clinical challenge. Accurate diagnosis of ovarian tumours can be given in all the cases correlating the clinicoradiological findings and histomorphological features which remains the gold standard.

REFERENCES