



Work-up for a suspected pelvic mass

TO KNOW:

- Ovarian cancer usually presents as an asymptomatic pelvic/ abdominal swelling.
- A careful history of GIT, bowel or urinary symptoms may help determine the origin of the mass.
- Family history of malignancy is important
- Abdominal TB with an omental cake (matted omentum) and lymphoma may mimic a gynaecological mass. These diagnoses need to be considered in younger women with advanced HIV, particularly if the mass is tender.
- Ovarian masses in pre-menopausal women: 20% are malignant
Ovarian masses in post-menopausal women: 80% are malignant
- Most women with ovarian cancer present late, with advanced disease (60% present with stage 3 disease)

ULTRASOUND FEATURES MORE SUGGESTIVE OF OVARIAN MALIGNANCY:

- Irregular, solid tumour
- Irregular, multilocular solid tumour > 10 cm
- Papillary structures within the capsule
- Ascites present
- Very high colour content on colour Doppler

The Risk of Malignancy Index (RMI) in ovarian tumours is a validated clinical tool used for risk stratification of ovarian lesions, to guide further management. The RMI combines three pre-surgical features: serum CA125 (CA125), menopausal status (M) and ultrasound score (U). The RMI is a product of the ultrasound scan score, the menopausal status and the serum CA125 level (IU/ml).

$$\text{RMI} = \text{U} \times \text{M} \times \text{CA125}$$

The ultrasound result is scored 1 point for each of the following characteristics: multilocular cysts, solid areas, metastases, ascites and bilateral lesions. U = 0 (for an ultrasound score of 0), U = 1 (for an ultrasound score of 1), U = 3 (for an ultrasound score of 2–5).

The menopausal status is scored as 1 = pre-menopausal and 3 = post-menopausal

Interpretation of RMI:

RMI score greater than 200: high risk, should be considered malignant and referred to Gynae Oncology

RMI score 25-200: intermediate risk should be discussed with a gynaecologist.

RMI score less than 25: low risk, can offer surgery at district level.

TO DO:

- STABLE PATIENTS SHOULD BE UNDER THE CARE OF A DISTRICT OR REGIONAL HOSPITAL FOR INITIAL WORK-UP.
- PATIENTS WITH COMPLICATIONS should be transferred to Tygerberg hospital:
 - Bowel obstruction
 - Symptomatic ascites
 - Large pleural effusion causing respiratory distress
 - Renal Failure
 - DVT or suspected pulmonary embolus

→ Contact the registrar on call for gynaecology

WORK-UP:

Patients can be admitted while all relevant investigations are being performed. This will speed-up referral and prevent loss to follow-up.

1. A pap smear must be done on these patients to exclude simultaneous cervical pathology
2. Careful breast exam to exclude primary breast carcinoma
3. FBC – look for anaemia
4. U&E and creatinine – exclude renal failure
5. ALP, GGT, AST, ALT – to detect liver metastases
6. Baseline CA 125 – to determine peritoneal involvement & used in the diagnostic algorithm for Risk of Malignancy Index. If pre-menopausal in addition β HCG, α -fetoprotein and LDH.
7. CEA to exclude colon cancer if there are bowel symptoms
 - a. If significant GIT/ bowel symptoms; consider gastroscopy or colonoscopy.
8. HIV test with consent – contact HIV counsellor to do counselling and rapid test 1st.
 - a. Take CD4 count if patient is positive. Patient must be informed of the result and be referred for initiation of Antiretrovirals.
9. Chest X-ray & report specifically ask to assess for lung metastases or pleural effusions.
 - a. If significant pleural effusion: tap and send for cytology to confirm stage 4 disease
10. Gynae (Transvaginal) ultrasound: comment on the size & characteristics of any adnexal masses. Look for bilateral disease. Ascites (ovarian malignancy is unlikely if no ascites is present).
11. Abdominal Ultrasound. Request radiographer to report on: liver metastases, pelvic or para-aortic lymph nodes, ascites.

- a. If a large volume of ascites is present, please do a tap and send for cytology.
- 12. RPR for syphilis and treat if positive.
- 13. Urine culture and treat if infection.

INITIAL TREATMENT:

- 1) Analgesia: Panado & IMI morphine if in severe pain.
Can convert IMI to oral mist morphine: 20mg/5mls. Give 2.5 ml orally, 4 hourly. The dose can be increased if pain not controlled.
- 2) Thrombophrophylaxis is very important in these patients as they may not be mobile:
Clexane 40mg S/C daily & calf compression (DVT stockings).

REFERRAL TO TYGERBERG HOSPITAL:

When work-up has been completed, the patient should be referred to Tygerberg. These pelvic mass cases must be discussed with the registrar in the gynaecology clinic on that day for an elective admission for assessment. Tel 021 938 5156

If the patient has already had surgery related to this malignancy include a copy of the THEATRE REPORT.

AUTHORISED BY	GS Gebhardt, FH van der Merwe
COMPILED BY	Z Momberg, L Terblanche, JL Butt
COMMITTEE RESPONSIBLE	Z Momberg, S Gebhardt, V Thomas, E Swart, L Muller, L Murray, J Butt, L Terblanche, A Cloete, J Kluge
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Signed: GS Gebhardt

Head: General Specialist Services; Obstetrics and Gynaecology