

Types of cysts

● **Physiological cysts:** mean diameter ≤ 3 cm

- ovarian follicle
- corpus luteum

● **Functional cysts** (can produce hormones):

- follicular cysts of the ovary (oestrogen): >3 cm
- corpus luteum cysts (progesterone)
- theca lutein cyst: gestational trophoblastic disease
- complications in functional cysts:
 - haemorrhage: see haemorrhagic ovarian cyst
 - enlargement
 - rupture
 - torsion

Other Cysts

- Multiple large ovarian cysts in ovarian hyperstimulation syndrome
- Post-menopausal cyst: serous inclusion cysts of the ovary
- polycystic ovaries
- ovarian torsion
- ovarian cystic neoplasms

Treatment

- Large (>3 cm) or symptomatic cysts may undergo surgical resection
- Smaller asymptomatic cysts are treated conservatively
- Risk of malignancy in septated ovarian cysts with no papillary projections or solid components are also considered low and are usually followed up on ultrasound

Follow-up guidelines

- As of late 2017, the most widely used guidelines is the 2010 consensus statement by the Society of Radiologists in Ultrasound .
- For simple ovarian cysts with no suspicious features on ultrasound, current follow-up guidelines are based on menopausal status and cyst size:

Reproductive Age

● ≤ 3 cm

- normal physiologic finding; at the discretion of the interpreting physician whether or not to describe them in the imaging report
- do not need follow-up

● >3 and ≤ 5 cm

- should be described in the imaging report with a statement that they are almost certainly benign
- do not need follow-up

● >5 and ≤ 7 cm

- should be described in the imaging report with a statement that they are almost certainly benign
- increased risk of ovarian torsion ⁴
- yearly follow-up with ultrasound recommended

● >7 cm

- may be difficult to assess completely with ultrasound and further imaging with MR or surgical evaluation should be considered

Post-menopausal women

● ≤ 1 cm

- are clinically inconsequential; at the discretion of the interpreting physician whether or not to describe them in the imaging report
- do not need follow-up

● >1 and ≤ 7 cm

- should be described in the imaging report with a statement that they are almost certainly benign
- yearly follow-up, at least initially, with ultrasound recommended
- some practices may opt to increase the lower size threshold for follow-up from 1 cm to as high as 3 cm
- one may opt to continue follow-up annually or to decrease the frequency of follow-up once stability or decrease in size has been confirmed
- cysts in the larger end of this range should still generally be followed on a regular basis

● >7 cm

- since these may be difficult to assess completely with ultrasound, further imaging with MRI or surgical evaluation should be considered