Other Topics

Modified on: Mon, 27 Nov, 2023 at 2:19 PM

FAQ-222: Why does O-RADS US have a low specificity in the higher risk categories with broad ranges of risk differing from the higher specificity of other RADS?

In the general population, ovarian cancer is of low prevalence. However, as it is a potentially highly lethal disease, the O-RADS US risk stratification system maximizes sensitivity rather than specificity to not miss an ovarian malignancy. MRI using the O-RADS MRI protocol and risk score can provide higher specificity with the use of IV contrast and diffusion weighted imaging and serves as a useful problem-solving tool in the O-RADS system.

The lower specificity of O-RADS US contrasts with some of the other American College of Radiology (ACR) Reporting and Data Systems (RADS), such as LI-RADS, which offers higher specificity. However, LI-RADS is used in a population at high risk for hepatocellular carcinoma which is not the same as O-RADS US which is intended to be used for patients at all levels of risk undergoing pelvic sonography for various indications.

Did you find FAQ-222 helpful? Yes (https://app.smartsheet.com/b/form/7737e609386c415d9929772d8505023b?Did%20you%20find%20this%20FAQ%20helpful?=Yes&RADS=LI-RADS&FAQ=FAQ-222) No (https://app.smartsheet.com/b/form/7737e609386c415d9929772d8505023b?Did%20you%20find%20this%20FAQ%20helpful?=No&RADS=LI-RADS&FAQ=FAQ-222)

FAQ-223: How does O-RADS US compare with other reporting adnexal reporting systems such as the SRU Consensus on Adnexal Cysts, ADNEX, IOTA Simple Rules and GI-RADS?

Multiple validation studies comparing the accuracy of O-RADS US to ADNEX, IOTA Simple Rules and GI-RADS have demonstrated equal or higher sensitivity for the detection of ovarian malignancy using O-RADS US 4 as the cutoff of malignancy. The specificity of O-RADS US has been relatively equal to these other systems, although lesions assessed as O-RADS US 3 or 4 in some studies have been at the lower end of the risk of malignancy range. Inter-reader agreement for O-RADS US has also been similar to these other systems.

The SRU Consensus on Adnexal Cysts cannot be directly compared to O-RADS US due to unique differences. The SRU guidelines have been helpful in determining which cystic lesions require follow-up, further imaging, or a surgical procedure. However, unlike the SRU guidelines, O-RADS US relies upon a standardized lexicon, based upon the IOTA model, which has been evaluated on a large data set of lesions that were surgically resected or clinically followed from IOTA phases 1–5 to assign a percent risk of malignancy. Percentile risk is not given in the SRU guidelines, nor are management strategies for higher risk lesions. In the original version of O-RADS US, management for some low-risk lesions including simple cysts differed from the SRU Consensus; however, version 2022 brings more consistency to the two guidelines. Specifically, O-RADS US v2022 now offers less surveillance of simple cysts, reclassifies cysts with a single smooth thin septation as “bilocular”, distinguishes early from late menopause for the management of hemorrhagic cysts and recommends clinical management per gynecology for classic benign lesions to allow necessary treatment of problems unrelated to malignancy (e.g., fertility, endometriosis, infection, etc.).

(https://app.smartsheet.com/b/form/7737e609386c415d9929772d8505023b?Did%20you%20find%20this%20FAQ%20helpful?=No&RADS=LI-RADS&FAQ=FAQ-223)
