Diagnostic Radiology Core Examination FAQs

What is the timeline for changes?

The first class to take the new examinations was the class entering radiology residency training (i.e., R1/PGY2 year) in July 2010. The first Core Examination was given during the first week of October 2013; subsequent examinations are given twice yearly at the ABR’s Chicago and Tucson Exam Centers. The first Certifying Examination is in fall 2015.

What happens if a candidate does not pass the oral exam by the final administration in November 2014?

Candidates who have not passed the oral examination by November 2014 will be required to take and pass both the Core and Certifying examinations to obtain board certification. Those who have conditioned the oral exam and have not passed by the final administration in November 2014 will be required to take one clinical module of the Certifying Examination in each failed category, plus the essentials and noninterpretive skills modules, to obtain board certification.

Why do I have to go to an official ABR Exam Center instead of taking the examination at a Pearson VUE Center?

Currently, the examinations cannot be administered at Pearson VUE centers because Pearson VUE software is unable to handle the modular exam content and case structure. In addition, Pearson VUE monitors are not calibrated, and the room lighting cannot be controlled. The ABR plans to have a distributed exam in the future and is currently working on a system to implement this.

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<th>Timeline for Exams</th>
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What is the difference between the previous initial qualifying (“written”) examination and the new Core Examination?

The initial qualifying (“written”/clinical) examination could be taken first after two years of radiology residency training. It tested basic knowledge and comprehension of anatomy, pathophysiology, diagnostic radiology, and physics. It was not an image-rich examination. It was graded as pass/fail. The new Core Examination is offered after 36 months of residency, is image rich and computer based, and examines in 18 subspecialty and modality categories. The exam must be passed overall and in each category to receive a passing result. The Core Examination can be considered as a combination of the previous physics, clinical, and oral exams.

What categories are included in the Core Examination?

The 18 categories are: breast, cardiac, gastrointestinal, interventional, musculoskeletal, neuroradiology, nuclear, pediatric, reproductive/endocrinology, thoracic, urinary, vascular, computed tomography, magnetic resonance, radiography/fluoroscopy, ultrasound, physics, and safety. In addition, the Radioisotope Safety Exam (RISE), one of the requirements for Authorized User (AU) eligibility status, is included within the Core Exam.

Who writes the questions for the Core Examination?

Item-writing committees in each category write items (questions and answer options) for the exam. The committees are composed of ABR-certified volunteers, all of whom must be participating in Maintenance of Certification (MOC). These volunteers are from academic and private practices across the U.S., including faculty in accredited residency programs and residency program directors. They receive special training in item writing before they begin their work.

What else do item-writing committees do?

After the writers compose items, they are vetted and edited by the entire category committee with the assistance of an ABR-trained exam developer and ABR content editors. During this process, questions and answer options are checked for ambiguity, word economy, inappropriately written answers, and consistency of style. Improvements are made as needed. Images are selected, and their quality is checked by the committee members. The committee then assembles the item into modules, which is a set of items conforming to the category blueprint and designated for a specific exam administration. At the annual Test Assembly meeting, attendees representing each category, including several ABR trustees, vet all items. Those deemed inappropriate for the exam, due to reasons such as content and relevance, are replaced by other items.

Why doesn’t the ABR just write a new examination each time?

The validity and reliability of exams are increased when some exam questions with good performance statistics are re-used, and when versions of the exam are “equated” to maintain a constant level for the passing standard. The ABR is committed to a fair examination process, which can be achieved only with valid and reliable instruments. In addition, item writing and developing modules that cover the domain/blueprint of each category is a time- consuming, lengthy, and expensive process.

How can I know what to study in order to prepare for this examination?
Several resources can be found on the ABR website at [http://www.theabr.org/ic-dr-core-exam](http://www.theabr.org/ic-dr-core-exam)

- a comprehensive study guide with sample questions
- a 110-item practice exam
- a sample of content for each organ-system-based Core Exam category
- links to Core Examination blueprints giving a concise outline of content to be tested in each category and percentage weights for subtopics.

**What can I study for quality and safety?**

Since the range of content relevant to the topic of radiology quality and safety is broad, a separate study guide has been produced to serve as a syllabus of the quality and safety knowledge that residents eligible to take the Core Exam are expected to know. A link to the Core Quality and Safety Study Guide is available for download [here](http://www.theabr.org).

**How is physics tested on this examination? Will it be similar to previous physics examinations?**

No identifiable physics module is included in this examination. Relevant physics questions are embedded in each category, and many are image based. However, physics is scored as a separate category and must be passed in order to pass the examination.

**How is the Core Examination scored?**

The Core Exam is criterion referenced, not norm referenced. This means that the pass/fail determination is made by assessing a candidate’s performance relative to a standard; it is not made by assessing a candidate’s performance relative to the peer group who took the exam. Theoretically, 100 percent of candidates could pass the exam if they all reached the passing standard.

The passing standard is determined by “Angoff committees,” a group of content experts and educators who, for each question on the exam, determine whether a resident just above the competency threshold would be expected to select the correct response. This standard psychometric process, known as Angoff standard setting, has been used by the ABR for many years for all of its “written” and computer-based examinations.

The Core Examination is scored in a two-step process, which is performed for each examinee:

**Step 1:** Each candidate must achieve an overall score above the Angoff standard on the exam as a whole.
- If yes, move to Step 2.
- If no, the candidate fails.

**Step 2:** Each candidate must achieve the conditioning threshold for all 18 categories.
- If yes, the candidate passes.
- If no in five or fewer categories, the candidate conditions.
- If no in more than five categories, the candidate fails.

**How and when will I receive my results?**
Results for the Core Exam are posted on each examinee’s password-protected myABR account approximately 8 to 10 weeks after the exam. You will receive an email when your exam results have been posted.

**Why do residents have to pass all 18 categories?**

The Core Exam is the last comprehensive exam taken by candidates. Therefore, the ABR trustees believe that it is important for all candidates to have at least a minimum standard of knowledge in each category.

**What happens if a resident fails a portion or the entire Core Examination? When can one retake the examination?**

If a candidate fails the exam overall, or fails six or more of the categories, he/she must repeat the entire examination. If one to five categories are failed, the candidate will have “conditioned” the examination and needs to retake only the categories that he/she failed. Opportunities to retake either the “conditioned” parts or the entire examination are available twice a year.

**How long does a candidate have to pass the Core Examination?**

Candidates have six years from the end of their training to successfully complete the initial certification process (Core and Certifying exams). This is the “board eligible” period. After that, candidates must take an additional year of training in a department with ACGME or RCPSC (Canada) accreditation before re-registering and re-entering the certification process.

**How will this change affect training programs?**

The breadth and depth of the training and learning experiences during the first 36 months of radiology residency may change because the resident must have experience in all aspects of diagnostic radiology before taking the examination. This timing is intended to encourage the gradual increase in resident responsibility throughout all four years of residency. Since July 2010, the ABR has allowed up to 16 months of experience during the residency in any one subspecialty, including research. Depending on the resources of each program, a resident thus may be able to subspecialize to some extent during his/her fourth year, rather than being constrained by studying for the oral examination.

**What were the results of the 2013 Core Examination?**

The results were similar to combined results of prior physics, clinical, and oral exams:

- Passed 87%
- Failed 11.5% (n=146)
- Conditioned 1.5% (n=16) All conditions were in physics.

**Why didn’t any candidate condition any section other than physics on the 2013 Core Examination?**

The conditioning threshold for physics was higher than any other category. If a candidate was weak in multiple categories, he or she failed the exam.

**Does the ABR listen to the candidates’ complaints?**
Yes, the ABR seeks candidate feedback to improve the examination experience. For example, the ABR received numerous complaints that there were no scheduled breaks, although adequate time was allotted during the exam period for each candidate to take unscheduled breaks. Actually, very few candidates took the entire period to complete the examination. Nevertheless, the ABR added an additional 30 minutes to each day to accommodate additional break time.

The ABR also received a number of complaints that there was “nothing I liked or could eat in the snacks provided.” In response, we provided individual lockers, and candidates can now bring their own snacks. The ABR will continue to provide bottled water but will not provide snacks.