



Discover Generics

Cost-Effective CT & MRI Contrast Agents



FRESENIUS
KABI

WATCH VIDEO

AJNR

Maintenance of Certification: Where We Are, Why We Are Here, and Where We Need to Be

R.D. Zimmerman

AJNR Am J Neuroradiol 2010, 31 (8) 1373-1376

doi: <https://doi.org/10.3174/ajnr.A2284>

<http://www.ajnr.org/content/31/8/1373>

This information is current as
of June 26, 2025.

Maintenance of Certification: Where We Are, Why We Are Here, and Where We Need to Be

In this issue of the *American Journal of Neuroradiology*, Yousem and Nidecker¹ reports on their survey, which revealed increased involvement in and compliance with the American Board of Radiology (ABR) Maintenance of Certification (MOC) process by members of the American Society of Neuroradiology (ASNR). In addition, Dr Yousem has done an excellent job of reviewing the MOC requirements themselves. Over 80% of ASNR members are registered for MOC. There has been an increase in the number of individuals who have taken the recertification examination, and participation in Self-Assessment Modules (SAMs) has dramatically increased as well. On the other hand, only 35% of ASNR members have started or completed Professional Quality Improvement (PQI) projects; many individuals are unaware of the requirement or are at a loss as to how to fulfill it. This is not surprising because this is the newest component of MOC to be defined. It is different from the other requirements because the chosen project must result in a change in clinical practice that cannot be easily accomplished by a single individual.

Compared with other radiology subspecialties (in particular those without subspecialty certification examinations) and other medical specialties (at least if anecdotal evidence is to be believed), involvement in MOC by neuroradiologists is extremely high. We owe a debt of gratitude to the far-sighted and politically savvy leaders of ASNR, who pushed for program accreditation by the Residency Review Committee and individual subspecialty certification by the ABR. There was considerable controversy at that time about the wisdom of pursuing this course and the value of subspecialty certification relative to the requirements. By and large, neuroradiologists now embrace the notion that we are a group of subspecialists who strive to achieve the highest standards of clinical skill to best serve our patients and referring physicians.

While the Yousem and Nidecker survey reveals that acceptance of the general principles of MOC is high, it also documents a growing dissatisfaction with the MOC process itself. Issues of the cost of MOC and the limited accessibility of the examination have been raised in the past and remain a source of concern for many neuroradiologists. The addition of the PQI requirement has produced consternation and confusion among some. The whole process has been called burdensome and bureaucratic. These issues have led some to question the value of MOC.

In the remainder of this editorial, I will address the specific and general complaints about MOC. I hope to convince you that in the current and evolving health care environment, involvement in subspecialty board certification and the MOC process is both necessary and good.

In his article, Yousem and Nidecker¹ note that it has not been possible to reduce the cost of overseeing the MOC process. Forbes and Yock (the neuroradiology trustees of the ABR at the time the MOC process was developed)² stated then that

costs would be “adjusted as the actual expenses are defined more clearly.” Lack of change should not be construed as a lack of attention to cost. During the past year, the ABR has undertaken a careful and systematic review of its operations. Last summer, the ABR held a financial staff retreat and the Board of Directors has spent considerable time during the past year developing a list of priorities, including eliminating activities that were deemed too expensive or of too little value. However, it is important to remember that the ABR has only 1 source of income, the fees paid for certification and MOC. This income must cover all ABR expenses including the development and improvement of the MOC processes. It is not used to subsidize other ABR programs. These projects involve considerable volunteer effort; however, there are costs associated with infrastructure, including strengthening IT support and hiring staff with the necessary skills to carry out this mission. It is also important to note that the ABR MOC fees are near the average charged by all American Board of Medical Specialties (ABMS) boards.

Accessibility of examination sites is an issue that has been raised because test centers near Chicago and Tampa (run by other medical groups) initially used for the MOC examination are no longer available to the ABR. Commercial testing centers such as Pearson VUE (Bethesda, Maryland) do not have the technical ability to administer our case-based, image-rich modular examinations. Because no commercial test sites can currently meet the requirements of our examinations, the ABR will provide, as an interim solution, 1 or more centrally located testing centers. These centers will also be used for MOC and initial subspecialty examinations (Certificate of Added Qualification). The ABR will also continue to offer the examination at its headquarters in Tucson as well as at both ASNR and Radiological Society of North America annual meetings.

The angst created by the ABMS PQI requirement is understandable. PQI is newly defined and, at first glance (okay, at second and third glance), it appears daunting. PQI projects have 9 steps carried out over several years. They involve issues of study design, data collection, change in behavior of many individuals (eg, technologists, nurses etc), and documentation that the project has produced a measurable improvement. The good news is that PQI projects can be shared by all or most radiologists in a practice or academic department. Templates for projects have been developed by the ASNR to allow radiologists to fulfill the PQI requirement. For instance, Dr Pina Sanelli has developed a PQI project concerning radiation dose reduction for CT scanning that can be used by all neuroradiologists.³ As we move forward, the ASNR will work with the ABR and other organizations such as the American College of Radiology to provide the necessary support for individuals and groups to meet this requirement. In addition, the ABMS and its member boards are working to develop institutional and group processes for creating, reviewing, and approving PQI projects. It is clear that we will need to develop central repositories or registries for PQI projects. While completion of PQI projects is burdensome, it seems to me that of all the MOC requirements, PQI is the most likely to yield measurable improvements in patient care. It may be hard to document that a radiologist who completes 10 SAMs provides better care than a radiologist who completes only 4 SAMs, but it would be

difficult to ignore the direct benefit to patients of a project that improves communication with referring physicians or reduces contrast reactions.

The dissatisfaction with MOC, however, transcends these specific issues and our specialty. One of my friends complained to me that it is unfair for us to have to enroll in such a time-consuming process while other physicians do not. His colleagues in other specialties may not be complaining to him about MOC, but they are just as unhappy about the process. The ABMS and its 24 member boards have all agreed on the element of MOC. So why are doctors so upset about this? It is true that involvement in MOC takes time and costs money, though, to be honest, I am surprised that the relatively modest cost of approximately \$300 per year is really an issue when the annual income of radiologists is relatively high.

One source of unhappiness for younger physicians is that more senior individuals with non-time-limited certification (eg, radiologists who became certified before 2002 who do not also hold subspecialty certification) are not required to enroll or participate in MOC. This seems unfair in particular in light of evidence that indicates (contrary to popular belief) that after the first few years of practice when performance peaks, the longer a physician is in practice the poorer his or her clinical skills/knowledge/judgment become.⁴ This issue recently received national attention when it was revealed that Rand Paul, Republican candidate for the Senate from Kentucky and a practicing ophthalmologist, was not certified by the American Board of Ophthalmology (an ABMS member board) but rather by the National Board of Ophthalmology (NBO). His explicit reason for not taking the ABO recertification examination was that older ophthalmologists did not have to enroll in MOC and take a recertification examination.⁵ One of my younger colleagues asked me why “The Board” does not force all radiologists to enroll in MOC. The reason is simple. Board certification is a voluntary process. Because virtually all radiology residents sign up and take the “Boards,” we tend to think of this as mandatory, but board certification is not required (at least for the moment—more on this later) for state licensure. Because the ABR cannot force someone to take the certifying examination in the first place, it cannot force anyone with a time-unlimited certificate to enroll in MOC. Until recently, radiologists with time-unlimited certificates showed little interest in enrolling in MOC. One bit of encouraging news: In the past 2 years, we have witnessed a definite increase in interest in the enrollment of entire practices of radiologists (including all those with time-unlimited certification) in MOC. Once again, this is not just a radiology issue. Only 1% of physicians with time-unlimited certificates from the American Board of Internal Medicine (ABIM) have signed up for MOC.

This problem of dual standards and low enrollment of time-unlimited diplomates is deemed of such importance that it was given a public airing in the *New England Journal of Medicine* (NEJM), where arguments for and against enrolling in MOC were presented.^{6,7} All authors agreed that in the interest of patient safety and health care quality, physicians must maintain a high level of knowledge and expertise. They argued about whether the MOC process achieved this goal. Those opposed to MOC in its current form believe that the process does not test the skills required for their specific practices and that to pass the MOC recertification examination, they would

have to familiarize themselves with aspects of medicine that were not germane to them. While this may be a problem in other specialties, the ABR has taken steps to ensure that our MOC process will be geared to the practice patterns of individual radiologists. There are general content requirements for all radiologists (eg, patient safety, contrast reactions). Once these requirements are satisfied, radiologists can choose Continuing Medical Education (CME) and SAM activities that meet their needs, and the MOC examination is structured such that the radiologist will be tested in those areas that are relevant to their practices. For neuroradiologists, the entire process is already in place. Because we have been at this for longer than other subspecialties, the ASNR has been able to provide our members with extensive CME and SAM content at our annual meeting and on our Web site. The neuroradiology MOC examination has been given for 5 years, and it has matured into an accurate tool for assessing our cognitive skills.

While the discussion in the NEJM was very high-minded (it is the NEJM after all), the debate elsewhere has been more emotional. It is only natural to believe that we are all practicing at a high level of competence and skill, and we see little need to spend time and money to document what we know to be “true.” But unless we measure what we are doing with an eye toward improvement, nothing will change. In the ABIM Practice Improvement Modules (PIMs) development and implementation (now ongoing for 11 years), physicians did baseline measures of activities in their practices that they were confident about. They felt their performance in these areas was excellent. Once they saw their baseline measures, they were shocked at the gaps in care and opportunities for improvement.⁸ Approximately three-fourths of internists completing PIMs claim that the experience changed their practices for the better. Many individuals fear that they will fail a high-stakes recertification examination, especially if it requires knowledge of esoteric facts or areas of medicine that are not part of their practices. In a survey conducted after the NEJM article was released, two-thirds of internists polled were against enrolling in MOC.⁹ In 2008, the Young Physicians Section of the American Medical Association put forward a resolution opposing MOC in its current form on the grounds that it is “burdensome for physicians in terms of cost, inconvenience and time away from their practices.” They wished to roll back or eliminate aspects of MOC.¹⁰ The discontent with the MOC process has led some physicians, including radiologists, to consider looking elsewhere for certification if the ABMS boards will not change their policies. Why not do what Rand Paul did and become certified by another board not affiliated with ABMS? The problem is that these non-ABMS boards lack the very things that ABMS provides, transparency and accountability. It did not take much research to reveal that the NBO was founded by Paul, that he is its president and director, and that the other members of the board are his wife and her parents. The NBO does not explain its certification process, and the number of certificate holders is unknown.⁵

Given the current public interest in physician qualifications, it is unlikely that certification by the NBO or similar boards in other specialties would be deemed equivalent to ABMS certification; this is the crux of the issue. The arguments of groups like the Young Physicians are striking in that they miss the important point that we are no longer free agents, able

to do whatever we want. The public, the government, payers, and health care organizations have made it clear that they will have a say in how physicians are judged, and they are not overly concerned about the inconvenience this will cause us. While physicians may dislike MOC, 80% of the public is in favor of it.⁹ The recent health care bill (Patient Protection and Affordable Care Act) contains measures that are meant to incentivize quality improvement and patient safety.¹¹ In the past, board certification was not needed to practice medicine, but this is no longer the case in many circumstances. The government and third-party payers are looking for measures of quality to improve patient safety and control costs. Numerous studies have documented that board-certified physicians have better outcomes than noncertified physicians.¹² There have been active discussions at the Federation of State Medical Licensing Boards about using participation in MOC as a proxy for Maintenance of Licensure (MOL).¹³ Some health care organizations now require that all of their physicians be ABMS board-certified, and in some circumstances, they are unwilling to accept unlimited certificates. At the ABR, we have seen an increase in the number of requests to take the subspecialty certification examinations from older fellowship-trained pediatric and neuroradiologists, who never bothered to take the examination. In the past, many of these individuals argued that subspecialty certification was of no value to them. So what accounts for this sudden change in attitude? It is likely that these individuals now understand that subspecialty certification and enrollment in MOC are or may become necessary conditions for their continued employment and/or for favorable reimbursement for their services. Increasingly, institutions, payers, and the government are looking for documentation of continuing educational activity and clinical accomplishment as a means of ensuring quality and safety. Evidence of participation in MOC is perhaps the easiest and most credible way to document these activities.

The one thing that unites supporters and detractors of MOC is a desire to keep physician certification out of the hands of the government or other third-party organizations. If you want a taste of what government control might be like, just look at the Institute of Medicine's (IOM) recommendations on resident duty hours.¹⁴ The rules were so onerous and impractical that had they been accepted, resident training (and as a consequence patient safety) would have been seriously impaired. It was the Accreditation Council for Graduate Medical Education (ACGME) (not known to most of us as a champion of less oversight or decreased bureaucracy) that responded to the IOM with a series of recommendations that addressed the issues raised by the IOM report in a manner that preserved our primacy in the training of our own residents.¹⁵ The ACGME shares many characteristics with the ABMS. It is a physician-run nongovernment organization. The response to the IOM was crafted by physicians who work for the Residency Review Committees and who, therefore, have intimate knowledge of issues involved in resident training. The ABMS is also physician-run, and its policies are determined by physicians who serve on the various member boards of the ABMS. Like the ACGME, its actions are transparent and it is accountable to its entire membership and to the public. Many of the recent ABMS-mandated changes in MOC, such as increasing the percentage of CME activity that must be SAMs and increasing the

number of PQI projects, are meant to demonstrate to all parties and the public that physicians can be trusted to certify and regulate themselves. It is the goal of the ABMS to obtain "deemed status" such that certification by an ABMS member board will be all that is needed for medical organization appointment and MOL, regardless of where one practices. At least in theory, this might eventually reduce some of the paperwork that most of us find so intrusive.

I have discussed why we need to be involved in MOC, but before concluding, I want to discuss why we should embrace the MOC process. For the past several decades, we as physicians have been granted the privilege to regulate ourselves. With this privilege comes the responsibility to strive to provide the best possible patient care. Physicians in general and radiologists in particular should be justifiably proud of our record in this regard. Being a doctor means more than just having a high-paying job. Our goal is to help people. Other professions have not maintained the same self-imposed high ethical standards. One need only read any of a number of books or articles about the actions of bankers in creating the recent financial crisis to see the gulf between groups that maintain core ethical values and police themselves and those that do not. At a time when we face new challenges and when the public is skeptical of any group's claim to be able to regulate itself, we must push for rigorous transparent measures of excellence. We must constantly increase our knowledge base, strive to improve our clinical skills, and work to enhance our practice environment. We must be able to demonstrate excellence not only to third parties but to ourselves. This is the essence of what it means to be a professional. Engagement in the MOC process is a means to this end.

It is easy to think of "The Board" as some abstract entity that is deciding our fate without our input, but nothing could be further from the truth. The Trustees of the ABR are all practicing radiologists. Gary Becker, the Executive Director of the ABR, is an internationally renowned interventional radiologist. We all have intimate personal knowledge of the challenges and frustrations facing radiologists. I have struggled just as much as you in trying to understand and fulfill the ever-changing MOC requirements. This knowledge drives the members of the Board of Trustees to improve the MOC process for all radiologists. Of course, we are constrained by the rules and policies of the ABMS, which is in turn constrained by public opinion as well as national political and economic realities. Within these constraints, it is important to understand that we do have a voice and it is and will continue to be heard. There are 2 neuroradiologists who are trustees of the board, and we also sit on the ASNR executive committee. It is our job to explain board policies to the ASNR and to transmit and champion ASNR positions to the ABR. The leaders of the ABR are completely supportive of this level of cooperation and communication.

So what should we be doing? The first priority is to provide neuroradiologists with the tools to make the PQI process as efficient as possible. This is the source of the greatest discontent with MOC and it must be addressed. The good news is that the ABR is well aware of this problem. PQI is just as new to the ABR as it is to you and me, and the ABR will be turning to organizations like the ASNR to help find solutions to the problems associated with PQI. Second, we must continue to ensure

that other components of MOC continue to reflect our practice patterns. The ABR has set up an MOC advisory committee to deal with this issue. At the outset of this editorial, I said that the leaders of ASNR who successfully pushed for fellowship accreditation and subspecialty certification were visionary. As a result of their efforts, ASNR and its members have been fully engaged in the MOC process for many years. Our society provides the bulk of the CME and SAM content in neuroradiology, and it is our members who produce the certifying and MOC examinations in neuroradiology. While we have done well, this is no time for complacency. Medical care in the United States is in flux to a degree not seen since the change in medical education and training that occurred following publication of the Flexner Report in 1910. Changes in our system will inevitably affect and produce changes in the MOC process. I would ask, rather than rant about the problems, that we all become part of the solution. Volunteer to work for the ABR. MOC is a complex process that has dramatically increased the work of the ABR, and we need all the help we can get from practicing radiologists. Contact ASNR leadership or me with issues that arise as you try to satisfy the requirements of MOC. We welcome input and will continue to seek improvements.

References

1. Yousem D, Nidecker A. **Maintenance of certification: update on attitudes of members of the American Society of Neuroradiology.** *AJNR Am J Neuroradiol* 2010;31:1369–72
2. Forbes GS, Yock DH. **Maintaining subspecialty certification in neuroradiology.** *AJNR Am J Neuroradiol* 2008;29:228
3. The American Board of Radiology. Diagnostic Radiology. PQI: What is it and

what do you need to do? http://theabr.org/moc/moc_presentation/pqi_sanel-li.html. Accessed July 22, 2010

4. Eva KW. **The aging physician: changes in cognitive processes and their impact on medical practice.** *Acad Med* 2002;77 (suppl):51–56
5. The Note. Rand Paul, Board-Certified Ophthalmologist. But which board? <http://blogs.abcnews.com/thenote/2010/06/rand-paul-boardcertified-ophthalmologist-but-which-board.html>. Accessed July 10, 2010
6. Levinson W, King TE Jr, Goldman L, et al. **American Board of Internal Medicine Maintenance of Certification Program.** *N Engl J Med* 2010;362:948–52
7. Drazen JM, Weinstein DF. **Considering recertification.** *N Engl J Med* 2010;362:946–47
8. Duffy FD, Holmboe ED. **Self-assessment in lifelong learning and improving performance in practice: physician know thyself.** *JAMA* 2006;296:1137–39
9. Cassel C. MedpageTODAY's KevinMD.com. ABIM: maintenance of certification—for the public. <http://www.kevinmd.com/blog/2010/04/abim-maintenance-certification-public.html>. Accessed July 21, 2010
10. AMA House of Delegates. HOD action: resolution 323 (A-08) adopted and amended as introduced by the Young Physicians Section on Improvements in Maintenance of Certification. <http://www.Ama-assn.org/ama1/pub/upload/mm/17/reportg.pdf>. Accessed July 21, 2010
11. OpenCongress. Patient Protection and Affordable Care Act. H.R. 3590. <http://www.opencongress.org/bill/111-h3590/text>. Accessed July 21, 2010
12. American Board of Medical Specialties. Fact Sheet: American Board of Medical Specialties (ABMS) and ABMS Maintenance of Certification (ABMS MOC). http://www.abms.org/News_and_Events/Media_Newsroom/pdf/ABMS_Fact_sheet.pdf. Accessed July 21, 2010
13. Report of the Board of Directors. Maintenance of Licensure. Adopted by the FSMB House of Delegates on April 24, 2010. <http://fsmb.org/pdf/mol-board-report-1003.pdf>. Accessed July 20, 2010
14. Enhancing sleep supervision and safety. www.iom.edu/Reports/2008/Resident-Duty-Hours-Enhancing-Sleep-Supervision-and-Safety.aspx. Accessed July 21, 2010
15. ACGME. Proposed Standards. <http://acgme-2010standards.org/proposed-standards.html>. Accessed July 21, 2010

R.D. Zimmerman

Department of Radiology

Weill Medical College of Cornell University

New York, New York

DOI 10.3174/ajnr.A2284